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ABSTRACT

Standardized curricula are provided for five courses for the secondary business technology programs in Mississippi: intensive business training; information processing; business computer applications; and computer programing technology (CPT) I and II. The 20 units of intensive business training include the following: keyboarding; operation of photocopy equipment; selecting and purchasing supplies; using references and resources; word processing; recordkeeping; database management; accounting; telephone techniques; and filing. Thirteen units in information processing include the following: keyboarding; making travel arrangements; planning and organizing meetings; word processing; database management; and machine transcription. Business computer applications has 14 units that include data management; word proccessing; electronic spreadsheet; integrated applications; computerized graphics; automated accounting; computerized filing; BASIC programing; computerized financial applications; and electronic communications. The nine units in CPT I and the nine units in CPT II include the following topics: hardware; software; data organization; computer operations; BASIC and COBOL language syntax and programing applications; software evaluation; and careers. Each unit consists of these components: objectives, with core/essential objectives indicated; suggested instructional practices; list of suggested resources; list of evaluation and suggested minimum performance standards, with core/essential objectives indicated; and performance record, with core/essential objectives indicated. A checklist for each course combining all unit performance standards into a single list is included. (YLB)

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CE058394

Standardized Curriculum For

Business Technology

Mississippi Department of Education
Bureau of
Vocational, Technical
and Adult Education

U.S. DEPARTMENT OF EDUCATION
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STANDARDIZED CURRICULA
FOR
BUSINESS TECHNOLOGY

MISSISSIPPI DEPARTMENT OF EDUCATION
BUREAU OF VOCATIONAL, TECHNICAL
AND ADULT EDUCATION

SPRING, 1988

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FOREWORD

This volume is intended to be used in the state of Mississippi as a mechanism for standardizing vocational education course titles and core contents. The need for standardization of curricula was triggered by provisions in the Educational Reform Act of 1982 which mandated:

-- elimination of nearly all currently existing curriculum requirements and development of new curriculum content that is "properly sequenced" and "coordinated";

-- steps to ensure that students master one level of course work before being advanced to the next level and that progression is properly sequenced;

-- a criterion-referenced statewide testing program that is built upon an identified set of "basic skills" keyed to student performance in grades 3, 5, 8, and 11;

-- revised graduation requirements that take into account student performance on the basic skills and also on a test of "functional literacy skills"; and

-- a system of accrediting schools that takes into account the performance of districts and schools and students.

In addition to the mandates of the Educational Reform Act, the Strategic Plan for Vocational and Technical Education in Mississippi also calls for improving the quality of vocational and technical education through the standardization of curricula and the articulation of secondary and postsecondary programs.

Both of these mandates were further reinforced by legislation passed in 1988 (Section 14, H.B. No. 601) which stated that the "State Department of Education shall provide an instructional program and establish guidelines and procedures for managing such a program in the public schools..." Local districts are encouraged to adapt this program and accompanying procedures to all instructional areas. Districts are given the option of adopting the instructional program and management system provided by the State Department of Education or adopting their own program as long as it meets or exceeds the criteria established by the State Department of Education.

The legislation calls the State Department of Education to provide for instructional program and management guidelines which require for every public school district that:

1. All courses taught in Grades K-8 containing skills tested through the Mississippi Basic Skills Assessment Program, all secondary school courses mandated for graduation, and all courses in the end-of-course testing program shall include the State Department of Education's written list of learning objectives.

2. The local school board must adopt the objectives that will form the core curriculum which will be systematically delivered throughout the district.

3. The set of objectives must be accompanied by suggested instructional practices and resources that would help teachers organize instruction. Such instructional practices and resources are to be used as suggestions and the goal of the program is mastery of the objectives by the students and not to limit the way a teacher may teach.

4. Standards for student performance must be established for each core objective in the local program and those standards establish the district's definition of mastery for each objective.

5. At least once during each school year, student performance on the set of learning objectives for each subject must be evaluated. Student performance on each objective must be measured at least once each year.

6. There shall be an annual review of student performance in the instructional program against locally established standards. When weaknesses exist in the local program, the district shall take action to improve student performance.

7. A permanent record of performance for each student must be maintained for all objectives tested by the Basic Skills Assessment Program and Functional Literacy Examination.

8. The State Board of Education and the board of trustees of each school district shall adopt policies to limit and reduce the number and length of written reports that classroom teachers are required to prepare.

9. The law shall not be construed to limit teachers from using their own professional skills to help students master the objectives, nor shall it be construed as a call for more detailed or complex lesson plans or any increase in testing at the local school district level.

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INTENSIVE BUSINESS TRAINING

COURSE GUIDE

Developed by

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COURSE OUTLINE

INTENSIVE BUSINESS TRAINING

Unit No.	Unit Title
1	Orientation
2	Keyboarding Skill Building
3	Safety
4	Human Relations
5	Job Application Process
6	Operation of Photocopy Equipment
7	Selecting and Purchasing Supplies
8	Planning and Organizing Work Activities
9	Following Company Policies and Procedures
10	Making Travel Arrangements
11	Using References and Resources
12	Introduction to Word Processing
13	Word Processing
14	Operating the Electronic Calculator
15	Recordkeeping
16	Database Management
17	Automated Accounting
18	Machine Transcription
19	Telephone Techniques
20	Filing

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Unit No.: 1 Unit Title: Orientation

Objectives: Upon completion of this unit, the student will:

*1. identify objectives of Intensive Business Training.
*2. identify individual gains from Intensive Business Training.
*3. list factors to consider in selecting a career.
*4. identify available occupations in Intensive Business Training.
*5. explain the leadership opportunities offered through membership in FBLA.
6. explain the purpose of competitive activities and chapter awards.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture and discussion
Guest speakers from retail establishments
Films or filmstrips available
Lab application and practice

Suggested Resources:

Primary Source: Office Education Units of Instruction. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Mississippi State Bureau of Vocational and Technical Education. Handbook for Mississippi Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education, 1987.

National Awards Programs for FBLA/PBL. Rockville, Maryland: Balfour Supply Service. 1988.

Leadership Development. 2nd ed. Manchester, Missouri: Gregg/McGraw Hill Publishing Company. 1986.

FBLA/PBL Handbook. 1st ed. Rockville, Maryland: Balfour Supply Service. 1986.

Elwood N. Chapman. Your Attitude Is Showing: A Primer on Human Relations. Chicago, Illinois: Science Research Associates, Inc. 1972.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will list three objectives of Intensive Business Training.

*Objective 2. The student will describe four ways that he or she can benefit from Intensive Business Training

*Objective 3. The student will identify four considerations in the selection of a career.

*Objective 4. The student will identify three occupations in Intensive Business Training in the local community.

*Objective 5. The student will explain the leadership opportunities offered through membership in FBLA.

Objective 6. The student will explain the purpose of competitive activities and chapter awards.

*Indicates core/essential objectives

Performance Record:

_____*1. Identified objectives of Intensive Business Training.

_____*2. Described individual gains from Intensive Business Training.

_____*3. Identified considerations in career selection.

_____*4. Identified occupations in Intensive Business Training in the local community.

_____*5. Explained the leadership opportunities offered through membership in FBLA.

_____ 6. Explained the purpose of competitive activities and chapter awards.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Unit No.: 2 Unit Title: Keyboarding Skill Building

Objectives: Upon completion of this unit, the student will:

*1. Increase typing speed 5-15 words per minute on 5-minute timed writings.
*2. Type for 5 minutes with 5 or fewer errors.

Suggested Instructional Practices:

Lecture, discussion, practical application

Suggested Resources:

Primary Source:

Additional Sources:
Clayton. *101 Timed Writings with Selected Drills*. 4th ed. Cincinnati, Ohio: South-Western Publishing Company. 1980
Typewriter
5-minute timer
Error analysis charts
Timed writing books
Typing drill books
Cortez Peters. *The Cortez Peters Championship Typing Drills*. 2nd ed. New York, NY: Gregg/McGraw Hill. 1987.
Cortez Peters. *Teacher's Kit and Skill Development Tapes*. Washington, DC: Cortez W. Peters, Jr. 1979.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will type for 5 minutes at a speed of at least 5 wpm faster than his/her first timed writing.
*Objective 2. The student will type for 5 minutes with 5 or fewer errors.

*Indicates core/essential objectives

Performance Record:

_____ *1. Increased typing speed 5-15 words per minute on 5-minute timed writings.
_____ *2. Typed for 5 minutes with 5 or fewer errors.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 3 Unit Title: Safety

Objective: *Upon completion of this unit, the student will identify correct safety procedures.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture, discussion, practical application

Suggested Resources:

Primary Source: Mississippi State Bureau of Vocational and Technical Education. *Activities and Resources Handbook*. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Additional Sources: Films (R/CU):
File It Under Falls, Miss King

Evaluation and Suggested Minimum Performance Standards:

*The student will identify the following correct safety procedures with at least 70% accuracy:

1. Keep the work station neat and the aisles clear.
2. Turn power off before adjusting or cleaning a machine.
3. Keep hair, hands, and jewelry out of typewriters, disk drives, and printers.
4. Take proper care of tools and machines assigned to you.
5. Report any equipment malfunction to the instructor immediately.
6. Do not engage in "practical jokes" in the classroom.
7. Do not attempt to operate a machine on which you have not been trained. Call the instructor for assistance when you need it.
8. Do not lean back in chairs.
9. Do not use chairs with casters to "roll" around the classroom.
10. Do not insert fingers or any foreign object into electrical outlets.

*Indicates core/essential objective

Performance Record:

____*Identified correct safety procedures.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 4 Unit Title: Human Relations

Objectives: Upon completion of this unit, the student will:

*1. Identify terms associated with human relations.
*2. Identify ways to establish and maintain positive employer-employee relationships.
*3. Identify ways to encourage positive co-worker relationships.
*4. Identify a basic guideline for serving customers.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture, discussion, and demonstration
Show filmstrips available

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Films (R/CU):
- Good Work Habits
- Person-to-Person Relationships
- What Do We Look Like to Others
- Your Job: You and Your Boss
- Dealing with Problem People

Films (Mississippi Research and Development Center Jackson, Mississippi):
- That's Not My Job
- The Will to Work
- The Marvelous Mousetrap
- Getting A Promotion There Must Be A Catch The Role of the Office Worker Time Management

Transparencies (R/CU):
- Human Relations: Fundamental Personality and Appearance in the Office

Elwood N. Chapman. Your Attitude is Showing. Chicago, IL: Science Research Associates. 1972.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify 7 out of 9 terms associated with human relations.

*Objective 2. The student will identify 4 out of 6 things an employee can do to establish a satisfactory relationship with the employer.

*Objective 3. The student will identify 3 out of 4 ways to encourage positive co-worker relationships.

*Objective 4. The student will identify 1 of the 2 basic guidelines for serving customers.

*Indicates core/essential objective

Performance Record:

____*1. Identified terms associated with human relations.

____*2. Identified ways to establish and maintain positive employer-employee relationships.

____*3. Identified ways to encourage positive co-worker relationships.

____*4. Identified a basic guideline for serving customers.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 5 Unit Title: Job Application Process

Objectives: Upon completion of this unit, the student will:

*1. prepare in typewritten form a
  a. personal data sheet.
  b. letter of application.
  c. job application form.
  d. follow-up letter.
  e. letter of resignation.
*2. identify possible sources of job placement.
*3. conduct him/herself appropriately on a personal interview for a job.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture, discussion, and practical application
Show filmstrips and transparencies available
Guest speakers

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Robert Zedlitz. Getting A Job. Cincinnati, Ohio: South-Western Publishing Co. 1987
Durwin Hohhertz. Job Related Instruction for Cooperative Part-time Training: Coordinator's Guide. Austin, Texas: East Texas State University. 1981.
Newspaper Application forms
Films (R/CU):
  Your Job: Applying For It
  How Do You Get There?
  Your Job: Good Work Habits
  Careers in Business and Office Occupations
Transparencies (R/CU):
  Career Planning
  You and Your Occupation
Video tape equipment and tapes
Mississippi State Bureau of Vocational and Technical Education. Handbook for Mississippi

Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1987.

Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Letters and data sheet must meet the following criteria:
  a. clear and concise presentation of facts with logical arrangement.
  b. correct use of grammar and punctuation, correct spelling, and acceptable typewritten format.

*Objective 2. Job application form must meet the following criteria:
  a. clear and concise presentation of facts.
  b. neatness and legibility.

*Objective 3. Conduct for a job interview must meet the following criteria:
  a. proper greeting, introduction, and closing.
  b. poise and maturity.
  c. attitude and interest.
  d. communications skills (grammar, speech, voice).
  e. demonstration of initiative, self-confidence, and assertiveness.
  f. presentation of facts in an orderly manner.
  g. career knowledge and career plans.
  h. qualifications for job.
  i. personal appearance (grooming and attire).

*Indicates core/essential objective

Performance Record:

____ *1. Prepared a personal data sheet.
____ *2. Prepared a letter of application.
____ *3. Prepared a job application form.
____ *4. Prepared a follow-up letter.
____ *5. Prepared a letter of resignation
____ *6. Identified possible sources of job placement.
____ *7. Conducted him/herself appropriately on a personal interview for a job.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 6 Unit Title: Operation of Photocopy Equipment

Objective: *Upon completion of this unit, the student will demonstrate the ability to operate a photocopier.

*Indicates core/essential objective

Suggested Instructional Practices:

Demonstration and practical application

Suggested Resources:

Primary Source: Manual for photocopy machine.

Additional Sources: Photocopier, paper and supplies.
Demonstration from salesman from Office Supply Co.

Evaluation and Suggested Minimum Performance Standards:

*The student will make a copy of a document using a photocopy machine. A check list to evaluate this objective must include the following:

1. Turn machine ON.
2. Load paper (8 1/2" x 11" or 11" x 14")
3. Adjust for light or dark copy.
4. Align original copy.
5. Set number of copies.
6. Turn machine OFF.

*Indicates core/essential objective

Performance Record:

____*Made a copy of a document using a photocopy machine.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 7 **Unit Title:** Selecting and Purchasing Supplies

Objectives: Upon completion of this unit, the student will:

*1. identify terms associated with purchasing supplies.
*2. identify objectives when purchasing supplies.
*3. identify two methods of obtaining supplies.
*4. identify the procedures for ordering supplies.
5. identify supplies for general office use.
*6. demonstrate the ability to prepare purchase orders, complete and extend totals, and compute cash and trade discounts.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application.

Suggested Resources:

Primary Source: Elaine Burrow. *General Clerical Duties and Related Information*. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Office supply catalogs.
Business math handbooks.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify 4 out of 5 terms associated with purchasing supplies.
*Objective 2. The student will identify 5 out of 7 objectives when purchasing supplies.
*Objective 3. The student will identify 2 methods of obtaining supplies.
*Objective 4. The student will identify the procedures for purchasing supplies with at least 70% accuracy.
Objective 5. The student will identify 7 out of 10 supplies for general office work.
*Objective 6. The student will:
  1. prepare a purchase order;
  2. complete and extend total; and
  3. compute case and trade discounts with at least 70% accuracy.

*Indicates core/essential objective

Performance Record:

____*1. Identify terms associated with purchasing supplies.
____*2. Identified objectives of purchasing supplies.
____*3. Identified two methods of obtaining supplies.
____*4. Identified the procedures for ordering supplies.
____ 5. Identified supplies for general office use.
____*6. Prepared purchase orders, completed and extended totals, and computed cash and trade discounts.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 8 Unit Title: Planning and Organizing Work Activities

Objectives: Upon completion of this unit, the student will:

*1. identify terms associated with work activities.
*2. identify advantages of planning.
3. identify disadvantages of working without a plan.
*4. identify the sequence of steps involved in planning and organizing work.
5. identify types of reminder devices that aid in planning and organizing work.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Office simulations

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify 4 out of 5 terms associated with work activities.
*Objective 2. The student will identify 5 out of 6 advantages of planning.
Objective 3. The student will identify 4 out of 5 disadvantages of working without a plan.
*Objective 4. The student will identify the sequence of steps involved in planning and organizing work with at least 70% accuracy.
Objective 5. The student will identify 2 out of 3 reminder devices that aid in planning and organizing work.

*Indicates core/essential objectives

Performance Record:

____ *1. Identified terms associated with work activities.
____ *2. Identified the advantages of planning.

____ 3. Identified the disadvantages of working without a plan.

____ *4. Identified the sequence of steps involved in planning and organizing work.

____ 5. Identified the various types of reminder devices that aid in planning and organizing work.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 9 Unit Title: Following Company Policies and Procedures

Objectives: Upon completion of this unit, the student will:

*1. identify terms associated with company policies and procedures.
*2. identify the purposes of policies and procedures.
*3. identify the types of policies.
*4. identify the types of procedures.
5. identify sources of information regarding policies and procedures.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Show filmstrips available

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Films (R/CU):
Procedures in the Office
School Handbook
Office simulations
Mississippi State Bureau for Vocational and Technical Education. Handbook for Mississippi Chapter Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1987.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify 5 out of 7 terms associated with company policies and procedures.
*Objective 2. The student will identify 6 out of 8 purposes for policies and procedures.
*Objective 3. The student will identify 6 out of 8 types of policies.
*Objective 4. The student will identify 2 out of 3 types of procedures.

Objective 5. The student will identify 3 out of 4 sources of information regarding policies and procedures.

*Indicates core/essential objectives

Performance Record:

____ *1. Identified terms associated with company policies and procedures.
____ *2. Identified the purpose of policies and procedures.
____ *3. Identified types of policies.
____ *4. Identified types of procedures.
____ 5. Identified sources of information regarding policies and procedures.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 10 Unit Title: Making Travel Arrangements

Objectives: Upon completion of this unit, the student will:

1. identify travel terms.
2. identify information required to make reservations.
3. identify the information included on an itinerary.
4. identify items to be included in a travel folder.
*5. classify expenses by general category as shown on an expense report.
6. demonstrate the ability to use a flight schedule, determine mileage from a mileage chart, use a rental car guide, estimate travel expenses, prepare a travel application, prepare an itinerary, and prepare an expense report.

*indicates core/essential objective

Suggested Instructional Practices:

Lecture, discussion, and practical application
Guest speakers

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Travel Agent
References:
  Airline guide
  Hotel/motel guides
  Car rental agency guides
  Mileage charts
  Brochures from travel agents
Office simulations
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

Objective 1. The student will identify 13 out of 18 travel terms.
Objective 2. The student will identify 13 out of 18 pieces of

information required when making airline, lodging, and rental car reservations.

Objective 3. The student will identify information required on an itinerary for a first entry, other entries, and final entry with 70% accuracy.

Objective 4. The student will identify items to be included in a travel folder with 70% accuracy.

*Objective 5. The student will classify travel expenses as lodging expense, meals expense, other expense, and transportation expense with at least 70% accuracy.

Objective 6. The student will:

1. determine air fare, time of first flight, the flight number, and round-trip flight cost for a trip using a flight schedule;
2. determine mileage for a trip from a mileage chart;
3. use a rental car guide to determine cost of renting an automobile;
4. prepare a travel application;
5. prepare an itinerary; and
6. prepare an expense report with at least 70% accuracy.

*Indicates core/essential objective

Performance Record:

____ 1. Identified travel terms.
____ 2. Identified information required to make reservations.
____ 3. Identified the information included on an itinerary.
____ 4. Selected material to be included in a travel folder.
____ *5. Classified expenses by general category as shown on an expense report.
____ 6. Used a flight schedule to determine air fare, flight time, flight number, and flight cost.
____ 7. Determined mileage from a mileage chart.
____ 8. Used a rental car guide to determine cost of renting an automobile.
____ 9. Estimated travel expenses.
____ 10. Prepared a travel application.
____ 11. Prepared an itinerary.
____ 12. Prepared an expense report.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: General Clerical Duties and Related Information

Unit No.: 11 Unit Title: Using References and Resources

Objectives: Upon completion of this unit, the student will:

*1. identify terms associated with reference books.
*2. identify four types of reference books available for use in an office.
*3. identify the three types of resources available for use by an office worker.
*4. demonstrate the ability to use a dictionary, word book, and a reference manual.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Dictionary, word book, reference manual, zip code directory, and telephone directory
Library
Typewriting style manual
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify 12 out of 17 terms associated with reference books.
*Objective 2. The student will identify 4 out of 6 reference books available for use in an office.
*Objective 3. The student will identify 2 out of 3 categories of resources available for use by an office worker.
*Objective 4. The student will:
    1. use a dictionary to write a short definition for CRT;

2. use a word book to determine where pamphlet can be hyphenated; and
3. use a reference book to determine the purpose of an attention line with at least 70% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Identified terms associated with reference books.
_____ *2. Identified types of reference books available for use in an office.
_____ *3. Identified the types of resources available for use by an office worker.
_____ *4. Used a dictionary to write a definition.
_____ *5. Used a word book to hyphenate a word.
_____ *6. Used a reference manual to determine the purpose of an attention line.

*Indicates core/essential objectives.

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: Information Processing

Unit No.: 12 Unit Title: Introduction to Word Processing

Objectives: Upon completion of this unit, the student will:

*1. identify terms associated with concepts in information processing.
2. identify structures associated with information processing and administrative support personnel.
3. identify job titles associated with information processing and administrative support personnel.
4. identify attitudes associated with information processing and administrative support personnel.
*5. identify skills associated with information processing and administrative support personnel.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Show filmstrips available
Show video cassette available
Field trip to word processing center

Suggested Resources:

Primary Source: Elaine Burrow: Introduction to Word Processing. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Bulletin Board
Video cassette (R/CU):
Taking the Mystery Out of Word Processing
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Research and Curriculum Unit for Vocational Research and Curriculum Unit for Vocational and Technical Education. 1986. Office simulations Microcomputer, diskettes, software, paper, printer, and ribbons
Film (R/CU):
Computers and You
Angela Griffin. Microcomputer Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical

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Education. 1981. (TRS 80 only)

Mississippi State Bureau for Vocational and Technical Education. *Handbook for Mississippi Chapter of Future Business Leaders of America.* Mississippi State, Mississippi: Research and Curriculum for Vocational and Technical Education. 1987.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify 12 out of 15 terms associated with information processing concepts.
Objective 2. The student will identify 3 out of 4 structures associated with information processing.
Objective 3. The student will identify 10 out of 12 job titles associated with information processing and administrative support personnel.
Objective 4. The student will identify 18 out of 24 attitudes that are considered important qualities for persons choosing careers in information processing.
*Objective 5. The student will identify 12 out of 16 skills that are important for persons choosing careers in information processing.

*Indicates core/essential objectives

Performance Record:

____ *1. Identified terms associated with information processing concepts.
____ 2. Identified structures associated with information processing and administrative support personnel.
____ 3. Identified job titles associated with information processing and administrative support personnel.
____ 4. Identified attitudes associated with information processing and administrative support personnel.
____ *5. Identified skills associated with information processing and administrative support personnel.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: Information Processing

Unit No.: 13 Unit Title: Word Processing

Objectives: Upon completion of this unit, the student will:

*1. demonstrate the ability to use word processing software.
*2. prepare letters using full block and modified block letter styles and prepare envelopes according to U.S. postal regulations.
*3. prepare various business forms.
*4. prepare memorandums, tables, minutes, and a formal business report.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Guest speakers
Field trips

Suggested Resources:

Primary Source: Elaine Burrow. Typing. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources:
Typewriting materials: letterhead, forms, envelopes, correction materials, typewriter, microcomputer, and diskettes
Bulletin board
FBLA Clerk Typist II competition material
Typewriting textbooks
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Reference manuals Mississippi State Bureau for Vocational and Technical Education. Handbook for Mississippi Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1987.
Typewriting simulations
Word processing software

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will be evaluated on this objective using the following checklist:

1. "Boot-up" the system.
2. Format a disk.
3. Load the word processing program.
4. Open a file.
5. Set tabs, margins, and page length.
6. Type the document.
7. Edit the document using insert, copy, replace, and delete options.
8. Edit the document to find format, typos, and spelling errors.
9. Save the document.
10. Print the document.

*Objective 2. The student will prepare letters using full block and modified block letter styles and prepare envelopes according to U.S. postal regulations.

*Objective 3. The student will prepare a personnel requisition form, a travel application form, a purchase requisition, an invoice, and a payroll form with at least 70% accuracy.

*Objective 4. The student will prepare a memorandum, minutes of a meeting, a table, and a formal business report with at least 70% accuracy.

*Indicates core/essential objectives.

Performance Record:

____ *1. Prepared and submitted a mailable document using word processing software.

____ *2. Prepared letters using full block and modified block letter styles and prepared envelopes according to U.S. postal regulations.

____ *3. Prepared a personnel requisition form, a travel application form, a purchase requisition, an invoice, and a payroll form with at least 70% accuracy.

____ *4. Prepared memorandums, tables, minutes, and a formal business report.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: Information Processing

Unit No.: 14 Unit Title: Operating the Electronic Calculator

Objective: *Upon completion of this unit, the student will demonstrate the ability to add, subtract, multiply and divide on the electronic calculator; and to compute percentages, and discounts.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture, discussion, and practical application

Suggested Resources:

Primary Source: Elaine Burrow. Office Machines. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources:
- Electronic calculator and supplies
- Electronic calculator instruction manuals
- Office machines simulations
- Office machines textbooks/workbooks
- Data entry software
- Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*The student will add, subtract, multiply, and divide on the electronic calculator; and compute percentages, and discounts with at least 70% accuracy.

*Indicates core/essential objective

Performance Record:

____ *Completed the following applications on the electronic calculator: add, subtract, multiply and divide, and computed percentages and discounts.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: Information Processing

Unit No.: 15 Unit Title: Recordkeeping

Objectives: Upon completion of this unit, the student will:

*1. complete a deposit slip, prepare checks, record information in a check register, and reconcile a bank statement.
*2. prove the petty cash book and replenish the petty cash fund.
*3. compute payroll plans.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application.

Suggested Resources:

Primary Source: Elaine Burrow. Financial Responsibilities. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources:
Electronic calculator and supplies: tapes and ribbons
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Bulletin board Local bank
Film (R/CU):
Basic Recordkeeping
Office simulations
Bank reconciliation projects

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will complete a deposit slip, prepare checks, record information in a check register and reconcile a bank statement with 70% accuracy.
*Objective 2. The student will prove the petty cash book and replenish the petty cash fund with at least 70% accuracy.
*Objective 3. The student will prepare a W-4 form, time card, payroll register, and payroll check with at least 70% accuracy.

*Indicates core/essential objectives

Performance Record:

____ *1. completed a deposit slip, prepared checks, recorded information in a check register, and reconciled a bank statement.

____ *2. proved the petty cash book and replenished the petty cash fund.

____ *3. prepared a W-4 form, time card, payroll register and payroll check.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: Information Processing

Unit No.: 16 Unit Title: Database Management

Objectives: Upon completion of this unit, the student will:

*1. complete a files management project on the microcomputer.
*2. design and print a database report.
*3. design and print mailing labels on the microcomputer.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application

Suggested Resources:

Primary Source: Database computer software

Additional Sources: Mississippi State Bureau for Vocational and Technical Education. *Activities and Resources Handbook*. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Data base textbooks
Data base projects

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Given the necessary data, the student will:
    1. Design a database file.
    2. Add forms to the file.
    3. Search and edit forms within the file.

*Objective 2. The student will design a report format and print a report from the database file.

*Objective 3. The student will design a mailing label and print mailing labels from the database file.

*Indicates core/essential objectives

Performance Record:

____ *1. completed a files management project on the microcomputer.
____ *2. designed and printed a data base report.
____ *3. designed and printed mailing labels.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: Information Processing

Unit No.: 17 Unit Title: Automated Accounting

Objective: *Upon completion of this unit, the student will complete manual and automated general ledger problems.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture, discussion, and practical application

Suggested Resources:

Primary Source: An accounting text
An accounting software package

Additional Sources:
Swanson, Ross, and Hanson. Century 21 Accounting, First-Year Course. 3rd/4th ed. Cincinnati, Ohio: South-Western Publishing Company. 1982/1987. (manual and software).
Guerrieri, Haber, Hayt, Turner. Concepts/Procedures/Applications, First Year Course. Houghton Mifflin Company. 1985.
Allen and Klooster. Automated Accounting for the Microcomputer. 1987.
Baron, Steinfield, and Schultheis. Practical Record Keeping and Bookkeeping. Cincinnati, Ohio: South-Western Publishing Company. 1983.
Automated Accounting Simulations (for students who have had accounting)
Mississippi State Bureau of Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Given a general ledger problem the student will complete the problem with at least 70% accuracy.

*Indicates core/essential objective

Performance Record:

____ *Solved manual and automated general ledger problems.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: Information Processing

Unit No.: 18 Unit Title: Machine Transcription

Objectives: Upon completion of this unit, the student will:

*1. identify features of transcription equipment.
*2. identify terms associated with transcription equipment.
*3. identify transcription techniques.
4. identify the five skills required of a transcriptionist.
*5. produce mailable documents from recorded dictation.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture/demonstration and practical application

Suggested Resources:

Primary Source: Elaine Burrow. Introduction to Word Processing. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Transcription tapes
Teacher-made tapes
Mississippi State Bureau for Vocational and Technical Education. Handbook for Mississippi Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1987.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify 4 out of 6 features of a transcription unit.
*Objective 2. The student will identify 9 out of 11 terms associated with transcription equipment.
*Objective 3. The student will identify transcribing techniques with at least 70% accuracy.
Objective 4. The student will identify the 5 skills required by a transcriptionist with at least 70% accuracy.
*Objective 5. The student will produce 3 mailable documents for recorded dictation.

*indicates core/essential objectives

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Performance Record:

_____ *1. Identified features of transcription equipment.
_____ *2. Identified terms associated with transcription equipment.
_____ *3. Identified transcription techniques.
_____ 4. Identified skills required of a transcriptionist.
_____ *5. Produced mailable documents from recorded dictation.

*Indicates core/essential objectives

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INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Unit No.: 19 Unit Title: Telephone Techniques

Objectives: Upon completion of this unit, the student will:

*1. handle telephone inquiries.
*2. plan and place a call.
*3. record messages.
*4. use the telephone directory.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Guest speakers
Field trips
Show transparencies and films available
Role playing

Suggested Resources:

Primary Source: Elaine Burrow. *Communications*. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Transparencies (R/CU):
  How to Win Friends by Telephone
Bulletin Board
Mississippi State Bureau for Vocational and Technical Education. *Activities and Resources Handbook*. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Films (R/CU):
  Person to Person: Making Communication Work for You
Microcomputer and word processing software
Practice telephone
Telephone procedures
Telephone directory

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will demonstrate the ability to handle telephone inquiries by completing activity 1, page 15-16 in the primary source with at least 70% accuracy.

*Objective 2. The student will demonstrate the ability to plan a call by completing activity 2, page 17 in the primary source with at least 70% accuracy.

*Objective 3. The student will demonstrate the ability to record messages by completing activity 3, page 19 in the primary source with at least 70% accuracy.

*Objective 4. Given a telephone directory and a list containing names for people, products, services, and businesses, the student will locate the telephone number for each with at least 70% accuracy.

*Indicates core/essential objectives

Performance Record

_____ *1. Handled telephone inquiries.
_____ *2. Planed a call.
_____ *3. Recorded messages.
_____ *4. Used the telephone directory to find numbers for people, products, services, and businesses.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Intensive Business Training

Topic: Intensive Business Training

Unit No.: 20 Unit Title: Filing

Objectives: Upon completion of this unit, the student will:

*1. identify terms, procedures, supplies, and equipment used in filing.
*2. demonstrate the ability to index, code, and alphabetize names; and cross reference names.
*3. demonstrate the ability to prepare index cards and file them using the numeric filing system.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Show filmstrips available

Suggested Resources:

Primary Source: Elaine Burrow. Filing. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Film (R/CU):
Filing Procedures
Bulletin board
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Filing Simulation
Samples of folders, guides, labels, correspondence

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify terms, procedures, supplies, and equipment used in filing with at least 70% accuracy.
*Objective 2. The student will demonstrate the ability to index, code, alphabetize names, and cross reference names with at least 70% accuracy.

*Objective 3. The student will demonstrate the ability to prepare index cards and file them using the numeric filing system with at least 70% accuracy.

*Indicates core/essential objectives

Performance Record:

____ *1. Identified terms, procedures, supplies, and equipment used in filing.
____ *2. Indexed, coded, and alphabetized names, and cross referenced names.
____ *3. Prepared index cards and filed then using the numeric filing system.

*Indicates core/essential objectives

INFORMATION PROCESSING (IBT II)

COURSE GUIDE

Developed by

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COURSE OUTLINE

INFORMATION PROCESSING (IBT II)

Unit No.	Title
1	Orientation
2	Keyboarding Skill Building
3	Safety
4	Human Relations
5	Job Application Process
6	Making Travel Arrangements
7	Planning and Organizing Meetings
8	Using References and Resources
9	Word Processing
10	Database Management
11	Automated Accounting
12	Machine Transcription
13	Telephone Techniques

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Unit No.: 1 Unit Title: Orientation

Objectives: Upon completion of this unit, the student will:

*1. identify objectives of Information Processing.
2. identify individual gains from Information Processing.
*3. list factors to consider in selecting a career.
4. identify available occupations in Information Processing
*5. explain the leadership opportunities offered through membership in FBLA.
6. explain the purpose of competitive activities and chapter awards.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture and discussion
Guest speakers from retail establishments
Films or filmstrips available
Lab application and practice

Suggested Resources:

Primary Source: Office Education Units of Instruction. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Mississippi State Bureau of Vocational and Technical Education. Handbook for Mississippi Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education, 1987.
National Awards Programs for FBLA/PBL. Rockville, Maryland: Balfour Supply Service. 1988.
Leadership Development. 2nd ed. Manchester, Missouri: Gregg/McGraw Hill Publishing Company. 1986.
FBLA/PBL Handbook. 1st ed. Rockville, Maryland: Balfour Supply Service. 1986.
Elwood N. Chapman. Your Attitude Is Showing: A Primer on Human Relations. Chicago, Illinois: Science Research Associates, Inc. 1972.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will list three objectives of Information Processing.

Objective 2. The student will describe four ways that he or she can benefit from Information Processing.

*Objective 3. The student will identify four considerations in the selection of a career.

Objective 4. The student will identify three occupations in BCA in the local community.

*Objective 5. The student will explain the leadership opportunities offered through membership in FBLA.

Objective 6. The student will explain the purpose of competitive activities and chapter awards.

*Indicates core/essential objectives

Performance Record:

_____*1. Identified objectives of Information Processing.
_____ 2. Described individual gains from Information Processing.
_____*3. Identified considerations in career selection.
_____ 4. Identified occupations in BCA in the local community.
_____*5. Explained the leadership opportunities offered through membership in FBLA.
_____ 6. Explained the purpose of competitive activities and chapter awards.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Unit No.: 2 Unit Title: Keyboarding Skill Building

Objectives: Upon completion of this unit, the student will:

*1. Increase typing speed 3-10 words per minute on 5-minute timed writings.
*2. Type for 5 minutes with 5 or fewer errors.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, practical application

Suggested Resources:

Primary Source:

Additional Sources:
Clayton. 101 Timed Writings with Selected Drills. 4th ed. Cincinnati, Ohio: South-Western Publishing Company. 1980
Typewriter
5-minute timer
Error analysis charts
Timed writing books
Typing drill books
Cortez Peters. The Cortez Peters Championship Typing Drills. 2nd ed. New York, NY: Gregg/McGraw Hill. 1987.
Cortez Peters. Teacher's Kit and Skill Development Tapes. Washington, DC: Cortez W. Peters, Jr. 1979.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will type for 5 minutes at a speed of at least 3 wpm faster than his/her first timed writing.
*Objective 2. The student will type for 5 minutes with 5 or fewer errors.

*Indicates core/essential objectives

Performance Record:

_____ *1. Increased typing speed 3-10 words per minute on 5-minute timed writings.
_____ *2. Typed for 5 minutes with 5 or fewer errors.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: General Clerical Duties and Related Information

Unit No.: 3 Unit Title: Safety

Objective: *Upon completion of this unit, the student will identify correct safety procedures.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture, discussion, practical application

Suggested Resources:

Primary Source: Mississippi State Bureau of Vocational and Technical Education. *Activities and Resources Handbook*. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Additional Sources: Films (R/CU):
File It Under Falls, Miss King

Evaluation and Suggested Minimum Performance Standards:

*The student will identify the following correct safety procedures with at least 70% accuracy:

1. Keep the work station neat and the aisles clear.
2. Turn power off before adjusting or cleaning a machine.
3. Keep hair, hands, and jewelry out of typewriters, disk drives, and printers.
4. Take proper care of tools and machines assigned to you.
5. Report any equipment malfunction to the instructor immediately.
6. Do not engage in "practical jokes" in the classroom.
7. Do not attempt to operate a machine on which you have not been trained. Call the instructor for assistance when you need it.
8. Do not lean back in chairs.
9. Do not use chairs with casters to "roll" around the classroom.
10. Do not insert fingers or any foreign object into electrical outlets.

*Indicates core/essential objective

Performance Record:

____*Identified correct safety procedures.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: General Clerical Duties and Related Information

Unit No.: 4 Unit Title: Human Relations

Objective: *Upon completion of this unit, the student will identify terms associated with human relations.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture, discussion, roleplaying, and demonstration
Show filmstrips available

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Films (R/CU):
  Good Work Habits
  Person-to-Person Relationships
  What Do We Look Like to Others
  Your Job: You and Your Boss
  Dealing with Problem People
Films (Mississippi Research and Development Center, Jackson, Mississippi):
  That's Not My Job
  The Will to Work
  The Marvelous Mousetrap
  Getting A Promotion
  There Must Be A Catch
  The Role of the Office Worker
  Time Management
Transparencies (R/CU):
  Human Relations: Fundamental Personality and Appearance in the Office
Elwood N. Chapman. Your Attitude Is Showing. Chicago, IL: Science Research Associates. 1972.

Evaluation and Suggested Minimum Performance Standards:

*The student will identify terms associated with human relations with at least 70% accuracy.

*Indicates core/essential objective

Performance Record:

____ *Identified terms associated with human relations.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: General Clerical Duties and Related Information

Unit No.: 5 Unit Title: Job Application Process

Objectives: Upon completion of this unit, the student will:

*1. prepare in typewritten form a
    a. personal data sheet.
    b. letter of application.
    c. job application form.
    d. follow-up letter.
    e. letter of resignation.
*2. identify possible sources of job placement.
*3. conduct him/herself appropriately on a personal interview for a job.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Show filmstrips and transparencies available
Guest speakers

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Robert Zedlitz. Getting A Job. Cincinnati, Ohio: South-Western Publishing Co. 1987
Durwin Hohhertz. Job Related Instruction for Cooperative Part-time Training: Coordinator's Guide. Austin, Texas: East Texas State University. 1981.
Newspaper Application forms
Films (R/CU):
  Your Job: Applying For It
  How Do You Get There?
  Your Job: Good Work Habits
  Careers in Business and Office Occupations
Transparencies (R/CU):
  Career Planning
  You and Your Occupation
Video tape equipment and tapes
Mississippi State Bureau of Vocational and Technical Education. Handbook for Mississippi

Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1987.

Mississippi State Bureau for Vocational and Technical Education. *Activities and Resources Handbook*. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Letters and data sheet must meet the following criteria:
  a. clear and concise presentation of facts with logical arrangement.
  b. correct use of grammar and punctuation, correct spelling, and acceptable typewritten format.

*Objective 2. Job application form must meet the following criteria:
  a. clear and concise presentation of facts.
  b. neatness and legibility.

*Objective 3. Conduct for a job interview must meet the following criteria:
  a. proper greeting, introduction, and closing.
  b. poise and maturity.
  c. attitude and interest.
  d. communications skills (grammar, speech, voice).
  e. demonstration of initiative, self-confidence, and assertiveness.
  f. presentation of facts in an orderly manner.
  g. career knowledge and career plans.
  h. qualifications for job.
  i. personal appearance (grooming and attire).

*Indicates core/essential objectives

Performance Record:

____ *1. Prepared a personal data sheet.
____ *2. Prepared a letter of application.
____ *3. Prepared a job application form.
____ *4. Prepared a follow-up letter.
____ *5. Prepared a letter of resignation
____ *6. Identified possible sources of job placement.
____ *7. Conducted him/herself appropriately on a personal interview for a job.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: General Clerical Duties and Related Information

Unit No.: 6 Unit Title: Making Travel Arrangements

Objectives: Upon completion of this unit, the student will:

1. identify travel terms.
*2. identify information required to make reservations.
3. identify the information included on an itinerary.
4. identify items to be included in a travel folder.
*5. classify expenses by general category as shown on an expense report.
*6. demonstrate the ability to use a flight schedule, determine mileage from a mileage chart, use a rental car guide, estimate travel expenses, prepare a travel application, prepare an itinerary, and prepare an expense report.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Guest speakers

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Travel Agent
References:
  Airline guide
  Hotel/motel guides
  Car rental agency guides
  Mileage charts
  Brochures from travel agents
Office simulations
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

Objective 1. The student will identify 13 out of 18 travel terms.
*Objective 2. The student will identify 13 out of 18 pieces of

information required when making airline, lodging, and rental car reservations.

Objective 3. The student will identify information required on an itinerary for a first entry, other entries, and final entry with 70% accuracy.

Objective 4. The student will identify items to be included in a travel folder with 70% accuracy.

*Objective 5. The student will classify travel expenses as lodging expense, meals expense, other expense, and transportation expense with at least 70% accuracy.

*Objective 6. The student will:

1. determine air fare, time of first flight, the flight number, and round-trip flight cost for a trip using a flight schedule;
2. determine mileage for a trip from a mileage chart;
3. use a rental car guide to determine cost of renting an automobile;
4. prepare a travel application;
5. prepare an itinerary; and
6. prepare an expense report with at least 70% accuracy.

*Indicates core/essential objectives

Performance Record:

____ 1. Identified travel terms.
____ *2. Identified information required to make reservations.
____ 3. Identified the information included on an itinerary.
____ 4. Selected material to be included in a travel folder.
____ *5. Classified expenses by general category as shown on an expense report.
____ *6. Used a flight schedule to determine air fare, flight time, flight number, and flight cost.
____ *7. Determined mileage from a mileage chart.
____ *8. Used a rental car guide to determine cost of renting an automobile.
____ *9. Estimated travel expenses.
____ *10. Prepared a travel application.
____ *11. Prepared an itinerary.
____ *12. Prepared an expense report.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: General Clerical Duties and Related Information

Unit No.: 7 Unit Title: Planning and Organizing Meetings

Objectives: Upon completion of this unit, the student will:

1. identify terms associated with planning meetings.
2. identify the characteristics of the three types of meetings.
*3. identify the steps to be taken when making pre-meeting arrangements.
*4. identify the pieces of information that must be gathered in order to schedule meeting facilities.
*5. identify the steps involved in reserving meeting facilities.
6. identify the information that must be included on a notice of a meeting.
*7. demonstrate the ability to compose and prepare a meeting notice and prepare an agenda.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application.

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Office simulations

Evaluation and Suggested Minimum Performance Standards:

Objective 1. The student will identify 3 out of 4 terms associated with planning meetings.

Objective 2. The student will identify characteristics of a conference or convention, formal meeting, and informal meeting with at least 70% accuracy.

*Objective 3. The student will identify three steps that must be taken when making pre-meeting arrangements with at least 70% accuracy.

*Objective 4. The student will identify five pieces of information that must be gathered in order to schedule meeting facilities with at least 70% accuracy.

*Objective 5. The student will identify four steps involved in reserving meeting facilities with at least 70% accuracy.

Objective 6. The student will identify four pieces of information that must be included on a notice of a meeting with at least 70% accuracy.

*Objective 7. The student will compose and prepare a mailable meeting notice, and an agenda. The notice must include day(s) of meeting, time, place, and purpose. The agenda must include items to be covered during meeting and any special events presentations, or actions.

*Indicates core/essential objectives

Performance Record:

____ 1. Identified terms associated with planning meetings.
____ 2. Identified the characteristics of three types of meetings.
____*3. Identified the steps to be taken when making pre-meeting arrangements.
____*4. Identified the pieces of information that must be gathered in order to schedule meeting facilities.
____*5. Identified the steps involved in reserving meeting facilities.
____ 6. Identified the information that must be included on a notice of a meeting.
_____*7. Composed and prepared a meeting notice and prepared an agenda.

*Indicates core/essential objectives

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INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: General Clerical Duties and Related Information

Unit No.: 8 Unit Title: Using References and Resources

Objectives: Upon completion of this unit, the student will:

*1. identify four types of reference books available for use in an office.
*2. identify the three types of resources available for use by an office worker.
*3. demonstrate the ability to use a reference manual.
*4. demonstrate the ability to use a dictionary.
*5. demonstrate the ability to use a word book.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Dictionary, word book, reference manual, zip code directory, and telephone directory
Library
Typewriting style manual
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify four types of reference books available for use in an office.
*Objective 2. The student will identify three types of resources available for use by an office worker.
*Objective 3. The student will demonstrate the ability to use reference manuals by completing Activity 1, page 353 in the primary reference with at least 70% accuracy.
*Objective 4. The student will demonstrate the ability to use a dictionary by completing Activity 4, page 359 in the primary reference with at least 70% accuracy.

*Objective 5. The student will demonstrate the ability to use a word book by completing Activity 5, page 361 in the primary reference with at least 70% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Identified four types of reference books available for use in an office.
_____ *2. Identified the three types of resources available for use by an office worker.
_____ *3. Used reference manuals to determine information.
_____ *4. Used a dictionary to identify languages from which words are derived, to divide words into syllables, to find word definitions, and to determine part(s) of speech for words.
_____ *5. Used a word book to determine how to hyphenate words, to write plural forms of words, and to write alternative spelling for words.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: Information Processing

Unit No.: 9 Unit Title: Word Processing

Objectives: Upon completion of this unit, the student will:

*1. demonstrate the ability to use word processing software (where computers are available).
*2. prepare letters using full block and modified block letter styles and prepare envelopes according to U.S. postal regulations.
*3. prepare various business forms.
*4. prepare memorandums, tables, minutes, and a formal business report.
*5. type a legal document.
*6. type a medical report.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Guest speakers
Field trips

Suggested Resources:

Primary Source: Elaine Burrow. Typing. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Typewriting materials: letterhead, forms, envelopes, correction materials, typewriter, microcomputer, and diskettes
Bulletin board
FBLA Clerk Typist II competition material
Typewriting textbooks
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Reference manuals Mississippi State Bureau for Vocational and Technical Education. Handbook for Mississippi Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education.

1987.
Typewriting simulations
Word processing software

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will be evaluated on this objective using the following checklist:
  1. "Boot-up" the system.
  2. Format a disk.
  3. Load the word processing program.
  4. Open a file.
  5. Set tabs, margins, and page length.
  6. Type the document.
  7. Edit the document using insert, copy, replace, and delete options.
  8. Edit the document to find format, typos, and spelling errors.
  9. Save the document.
  10. Print the document.

*Objective 2. The student will prepare letters using full block and modified block letter styles and prepare envelopes according to U.S. postal regulations.

*Objective 3. The student will prepare a personnel requisition form, a travel application form, a purchase requisition, an invoice, and a payroll form with at least 70% accuracy.

*Objective 4. The student will prepare a memorandum, minutes of a meeting, a table, and a formal business report with at least 70% accuracy.

*Objective 5. The student will type a mailable legal document.

*Objective 6. The student will type a mailable medical report.

*Indicates core/essential objectives

Performance Record:

____ *1. Prepared and submitted a mailable document using word processing software.
____ *2. Prepared letters using full block and modified block letter styles and prepared envelopes according to U.S. postal regulations.
____ *3. Prepared a personnel requisition form, a travel application form, a purchase requisition, an invoice, and a payroll form.
____ *4. Prepared memorandums, tables, minutes, and a formal business report.
____ *5. Typed a legal document.
____ *6. Typed a medical report.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: Information Processing

Unit No.: 11 Unit Title: Database Management

Objectives: Upon completion of this unit, the student will:

*1. complete a files management project on the microcomputer.
*2. design and print a database report.
*3. design and print mailing labels on the microcomputer.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application

Suggested Resources:

Primary Source: Database computer software

Additional Sources: Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Database textbooks
Database projects

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Given the necessary data, the student will:
  1. Design a database file.
  2. Add forms to the file.
  3. Search and edit forms within the file.

*Objective 2. The student will design a report format and print a report from the database file.

*Objective 3. The student will design a mailing label and print mailing labels from the database file.

*Indicates core/essential objectives

Performance Record:

____ *1. Completed a files management project on the microcomputer.
____ *2. Designed and printed a data base report.
____ *3. Designed and printed mailing labels.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: Information Processing

Unit No.: 12 Unit Title: Automated Accounting

Objective: Upon completion of this unit, the student will:

*1. complete automated general ledger problems.
*2. complete automated accounts payable problems.
*3. complete automated accounts receivable problems.
*4. complete automated payroll problems.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application

Suggested Resources:

Primary Source: An accounting text
An accounting software package

Additional Sources: Swanson, Ross, and Hanson. *Century 21 Accounting, First-Year Course*. 3rd/4th ed. Cincinnati, Ohio: South-Western Publishing Company. 1982/1987. (manual and software).
Guerrieri, Haber, Hayt, Turner. *Concepts/ Procedures/Applications, First Year Course*. Houghton Mifflin Company. 1985.
Allen and Klooster. *Automated Accounting for the Microcomputer*. 1987.
Baron, Steinfield, and Schultheis. *Practical Record Keeping and Bookkeeping*. Cincinnati, Ohio: South-Western Publishing Company. 1983.
Automated Accounting Simulations (for students who have had accounting)
Mississippi State Bureau of Vocational and Technical Education. *Activities and Resources Handbook*. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Given a general ledger problem the student will complete the problem with at least 70% accuracy.
*Objective 2. Given an automated accounts payable problem the student will complete the problem with at least 70%

accuracy.

*Objective 3. Given an automated accounts receivable problem, the student will complete the problem with at least 70% accuracy.

*Objective 4. Given an automated payroll problem, the student will complete the problem with at least 70% accuracy.

*indicates core/essential objectives

Performance Record:

____ *1. Solved automated general ledger problems.
____ *2. Solved automated accounts payable problems.
____ *3. Solved automated accounts receivable problems.
____ *4. Solved automated payroll problems.

*indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Topic: Information Processing

Unit No.: 13 Unit Title: Machine Transcription

Objective: *Upon completion of this unit, the student will produce mailable documents from recorded dictation.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture/demonstration and practical application

Suggested Resources:

Primary Source: Elaine Burrow. Introduction to Word Processing. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Transcription tapes
Teacher-made tapes
Mississippi State Bureau for Vocational and Technical Education. Handbook for Mississippi Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1987.

Evaluation and Suggested Minimum Performance Standards:

*The student will produce 3 mailable documents from recorded dictation.

*Indicates core/essential objectives

Performance Record:

_____ *Produced 3 mailable documents from recorded dictation.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Information Processing (IBT II)

Unit No.: 14 Unit Title: Telephone Techniques

Objectives: Upon completion of this unit, the student will:

*1. handle telephone inquiries.
*2. plan a call.
*3. record messages.
*4. use the telephone directory.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and practical application
Guest speakers
Field trips
Show transparencies and films available
Role playing

Suggested Resources:

Primary Source: Elaine Burrow. Communications. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Transparencies (R/CU):
How to Win Friends by Telephone Bulletin Board
Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Films (R/CU):
Person to Person: Making Communication Work for You
Microcomputer and word processing software
Practice telephone
Telephone procedures Telephone directory

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will demonstrate the ability to handle telephone inquiries by completing activity 1, page 15-16 in the primary source with at least 70% accuracy.
*Objective 2. The student will demonstrate the ability to plan a call by completing activity 2, page 17 in the primary source with at least 70% accuracy.
*Objective 3. The student will demonstrate the ability to record

messages by completing activity 3, page 19 in the primary source with at least 70% accuracy.

*Objective 4. Given a telephone directory and a list containing names for people, products, services, and businesses, the student will locate the telephone number for each with at least 70% accuracy.

*indicates core/essential objectives

Performance Record

______ *1. Handled telephone inquiries.
______ *2. Planed a call.
______ *3. Recorded messages.
______ *4. Used the telephone directory to locate telephone numbers for people, products, services, and businesses.

*indicates core/essential objectives

BUSINESS COMPUTER APPLICATIONS

COURSE GUIDE

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COURSE OUTLINE

BUSINESS COMPUTER APPLICATIONS

Unit No.	Title
1	Introduction to Computers
2	Safety
3	Orientation
4	Data Management
5	Word Processing
6	Electronic Spreadsheet
7	Integrated Applications
8	Computerized Graphics
9	Automated Accounting
10	Computerized Filing
11	Introduction to BASIC Programming
12	Computerized Financial Applications
13	Electronic Communications
14	Job Application Process

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 1 Unit Title: Introduction to Computers

Objectives: Upon completion of this unit, the student will:

*1. Identify the advantages and disadvantages of the computer to individuals and businesses.
*2. Identify the roles of and equipment used for input, processing and output in an information system.
*3. Identify common disk operating system procedures.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, demonstration, and activities

Suggested Resources:

Primary Source: An introduction to computer textbook

Additional Sources: Clark/Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Company. 1985.
Ellen Richman. Spotlight Computer Literacy. New York, New York: Random House School. 1985.
Wood. Computer Awareness. Cincinnati, Ohio: South-Western Publishing Company. 1982.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will identify the advantages and disadvantages of the computer to individuals in business with at least 70% accuracy.
*Objective 2. The student will identify the roles of and equipment used for input, processing and output in an informa-- tion system with at least 70% accuracy.
*Objective 3. The student will identify common disk operating system procedures with at least 70% accuracy.

*Indicates core/essential objectives

Performance Record:

____*1. Identified advantages and disadvantages of the computer to individuals and businesses.
____*2. Identified the roles of and equipment used for input, processing and output in an information system.

____*3. Identified common disk operating systems procedures.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 2 Unit Title: Safety

Objective: *Upon completion of this unit, the student will identify correct safety procedures.

*Indicates core/essential objective

Suggested Instructional Practices:

Lecture, demonstration, and discussion

Suggested Resources:

Primary Source: Mississippi State Bureau of Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Additional Sources: Guest speakers from Mississippi Power Company, Mississippi Red Cross, Farm Bureau Insurance Company, local fire department

Evaluation and Suggested Minimum Performance Standards:

*The student will identify the following correct safety procedures with at least 70% accuracy.

1. Keep the work station neat and the aisles clear.
2. Turn power off before adjusting or cleaning a machine.
3. Keep hair, hands, and jewelry out of typewriters, disk drives, and printers.
4. Take proper care of tools and machines assigned to you.
5. Report any equipment malfunction to the instructor immediately.
6. Do not engage in "practical jokes" in the classroom.
7. Do not attempt to operate a machine on which you have not been trained. Call the instructor for assistance when you need it.
8. Do not lean back in chairs.
9. Do not use chairs with casters to "roll" around the classroom.
10. Do not insert fingers or any foreign object into electrical outlets.

*Indicates core/essential objective

Performance Record:

_____ *Identified correct safety procedures.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 3 Unit Title: Orientation

Objectives: Upon completion of this unit, the student will:

- *1. identify objectives of BCA.
- *2. identify individual gains from BCA.
- *3. list factors to consider in selecting a career.
- *4. identify available occupations in BCA.
- *5. explain the leadership opportunities offered through membership in FBLA.
- *6. explain the purpose of competitive activities and chapter awards.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture and discussion
Guest speakers from retail establishments
Films or filmstrips available
Lab application and practice

Suggested Resources:

Primary Source: Office Education Units of Instruction. Commerce, Texas: East Texas State University, Occupational Curriculum Laboratory. 1981.

Additional Sources: Mississippi State Bureau of Vocational and Technical Education. Handbook for Mississippi Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education, 1987.

National Awards Programs for FBLA/PBL. Rockville, Maryland: Balfour Supply Service. 1988.

Leadership Development. 2nd ed. Manchester, Missouri: Gregg/McGraw Hill Publishing Company. 1986.

FBLA/PBL Handbook. 1st ed. Rockville, Maryland: Balfour Supply Service. 1986.

Elwood N. Chapman. Your Attitude Is Showing: A Primer on Human Relations. Chicago, Illinois: Science Research Associates, Inc. 1972.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. The student will list three objectives of BCA.

*Objective 2. The student will describe four ways that he or she can benefit from BCA.
*Objective 3. The student will identify four considerations in the selection of a career.
*Objective 4. The student will identify three occupations in BCA in the local community.
*Objective 5. The student will explain the leadership opportunities offered through membership in FBLA.
*Objective 6. The student will explain the purpose of competitive activities and chapter awards.

*Indicates core/essential objectives

Performance Record:

_____*1. Identified objectives of BCA.
_____*2. Described individual gains from BCA.
_____*3. Identified considerations in career selection.
_____*4. Identified occupations in BCA in the local community.
_____*5. Explained the leadership opportunities offered through membership in FBLA.
_____*6. Explained the purpose of competitive activities and chapter awards.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 4 Unit Title: Data Management

Objectives: Upon completion of this unit, the student will:

*1. design a file.
*2. add forms to the file.
*3. edit selected forms.
*4. delete selected forms.
*5. generate reports.
*6. print labels.

*indicates core/essential objectives

Suggested Instructional Practices:

Instruction and practical application
Application problems for preparing a database and merging a report from the database with a word processing document

Suggested Resources:

Primary Source: Data base and report software

Additional Sources:
H. Mark Lovern. Calculator Applications for Businesses. Cincinnati, Ohio: South-Western Publishing Co. 1982.
James Clark and Judith Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.
William O. Drum. Database Applications. Cincinnati, Ohio: South-Western Publishing Co. 1986.
Mississippi State Bureau of Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Jeffrey R. Stewart, Sandra R. McMinnis, and Nancy M. Melesco. 101 Database Exercises. New York, NY: McGraw-Hill Book Co. 1987.
Olinzock and Santos. Microcomputer Simulations in Business. Cincinnati, Ohio: South-Western Publishing Co. 1986.
Data base software:
  Lotus 1-2-3
  PFS File and Report
  Profile
  First Choice

PC File and Report
Filing and Reporting Assistant
Steven L. Mandell. *Working With Applications Software*. St. Paul, MN: West Publishing Co. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objectives 1-6. Given a practical application for a data base, the student will:

1. design a file.
2. add forms to the file.
3. edit selected forms.
4. delete selected forms.
5. generate reports.
6. print labels.

*indicates core/essential objectives

Performance Record:

______*1. Designed a file.
______*2. Added forms to the file.
______*3. Edited selected forms.
______*4. Deleted selected forms.
______*5. Generated reports.
______*6. Printed labels.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 5 Unit Title: Word Processing

Objective: *Upon completion of this unit, the student will create and print a mailable document.

*Indicates core/essential objective

Suggested Instructional Practices:

Instruction and practical application

Suggested Resources:

Primary Source: Word processing software

Additional Sources:
Iris Blanc. Skill Building Exercises for the Word Processor. New York, NY: Dictation Disc Co. 1985.
John W. Meroney. Word Processing Applications in Practice. Cincinnati, Ohio: South-Western Publishing Co. 1984.
Sally Graham. Working Your Way Through WordStar. Cincinnati, Ohio: South-Western Publishing Co. 1985.
Lloyd D. Brooks. 101 Word Processing Exercises. New York, NY: McGraw-Hill Book Co. 1986.
Carol M. Lehman, Mark W. Lehman, and Connie J. Forde. TRS-80 Word Processing Applications Using Superscripsit. Reston, Virginia: Reston Publishing Company, Inc. 1984.
Mississippi State Bureau of Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.
Word Processing Software
  SuperScripsit
  WordStar
  PFS Write
  PC-Write
  Writing Assistant
  First Choice
  Word Perfect (Apple)
  Apple Writer
  Workmates
  Deskmate
Steven L. Mandell. Working With Application

Software. St. Paul, MN: West Publishing Co. 1986.

Evaluation and Suggested Minimum Performance Standards:

*The student will use a word processing program to create and print a mailable document. The following program features will be used:

1. create a document.
2. page format.
    a. tabs.
    b. margins and page length.
    c. line spacing.
3. input text.
    a. insert text.
    b. replace text.
    c. delete text.
    d. center.
    e. underline
4. edit document.
    a. insert/delete a blank line.
    b. find and replace.
    c. block editing.
        (1) copy.
        (2) move.
        (3) delete.
5. spell check document.
6. save document.
7. print document.
    a. print selected text.
    b. print entire document.
8. get an existing file.

*Indicates core/essential objective

Performance Record:

_____ 1. Created and printed a mailable document.

*Indicates core/essential objective

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INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 6 Unit Title: Electronic Spreadsheet

Objective: *Upon completion of this unit, the student will prepare an appropriate template and insert given data on an electronic spreadsheet for a personal, a business, and an educational application.

*Indicates core/essential objective

Suggested Instructional Practices:

Introduce spreadsheets by completing a manual applications (such as a three-day vacation planner.
Introduce electronic spreadsheet.
Provide drills and applications in personal, business, and educational areas.
Provide application problems for preparing a spreadsheet and merging the spreadsheet with a word processing document.

Suggested Resources:

Primary Source: Electronic spreadsheet software

Additional Sources: Steven Ross. Understanding and Using Lotus 1-2-3. St. Paul, Minnesota: West Publishing Co. 1986.
Close and Hite. Spreadsheets Principles and Applications Using VisiCalc. Cincinnati: Ohio: South-Western Publishing Co. 1985.
Iris Blanc and Cathy Vento. Spreadsheets Skill Building Exercises and Applications. New York, NY: Dictation Disc Company. 1986.
Brooks. 101 Spreadsheet Exercises. Atlanta, GA: Gregg Division, McGraw-Hill. 1987.
H. Mark Lovern. Calculator Applications for Business Careers. Cincinnati, Ohio: South-Western Publishing Co. 1982.
Steven L. Mandell. Working With Application Software. St. Paul, MN: West Publishing Co. 1986.

Evaluation and Suggested Performance Standards:

*The student will use a spreadsheet program to prepare an appropriate template and insert given data for a personal, a business, and an educational application with at least 70% accuracy. The following features will be used:

1. column headings.

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2. row headings.
3. delete headings.
4. set cell styles.
5. type values in cells.
6. create formulas.
7. recalculate.
8. print.

*indicates core/essential objective

Performance Record:

______ *Prepared an appropriate template and inserted given data for a personal, a business, and an educational application.

*indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 7 Unit Title: Integrated Applications

Objective: *Upon completion of this unit, the student will merge a database application and a spreadsheet application with a word processing document.

*Indicates core/essential objective

Suggested Instructional Practices:

Instruction and practical application

Suggested Resources:

Primary Source: PFS:First Choice. Version 1.0. Mountain View, California: Software Publishing Company. 1986.

Evaluation and Suggested Minimum Performance Standards:

*The student will merge a spreadsheet and a database report with a word processing document.

*Indicates core/essential objective

Performance Record:

_____ *Completed an integrated application.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 8 Unit Title: Computerized Graphics

Objective: *Upon completion of this unit, the student will generate and print graphs from given data.

*Indicates core/essential objective

Suggested Instructional practices:

Provide activities for preparing graphs from scratch.
Provide application problems for preparing graphs from previously prepared databases.
Provide application problems for preparing graphs and joining them to word processing documents.

Suggested Resources:

Primary Source. Graphing software and manuals.

Additional Sources: Software
PC-File and PC-Graph
Graph-In-A-Box
PFS-Graph
SuperCALC 3
Steven L. Mandell. *Working with Applications Software*. St. Paul, Minnesota: West Publishing Co. 1986.

Evaluation and Suggested Minimum Performance Record:

*The student will generate and print a pie chart and a bar chart from a spreadsheet, a database, or word processing data with at least 70% accuracy.

*Indicates core/essential objective

Performance Record:

_____ *Used a graphics software program to generate a pie chart and a bar chart.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 9 Unit Title: Automated Accounting

Objective: *Upon completion of this unit, the student will demonstrate mastery of an integrated accounting software package: general ledger and payroll.

*Indicates core/essential objective

Suggested Instructional practices:

Provide instruction on basic accounting principles.
Assign drills and problems to be done manually and on the computer.
Provide problems in such areas as general ledger, accounts receivable, accounts payable, and payroll.

Suggested Resources:

Primary Source: An accounting text
An accounting software package

Additional Sources: Swanson, Ross, and Hanson. Century 21 Accounting, First-Year Course. 3rd/4th ed. Cincinnati, Ohio: South-Western Publishing Company. 1982/1987. (manual and software).
Guerrieri, Haber, Hayt, Turner. Concepts/Procedures/Applications, First Year Course. Houghton Mifflin Company. 1985.
Allen and Klooster. Automated Accounting for the Microcomputer. 1987.
Baron, Steinfield, and Schultheis. Practical Record Keeping and Bookkeeping. Cincinnati, Ohio: South-Western Publishing Company. 1983.
Automated Accounting Simulations (for students who have had accounting)
Mississippi State Bureau of Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Given a general ledger problem and a payroll accounting problem, the student will complete required accounting procedures using a microcomputer with at least 70% accuracy.

*Indicates core/essential objective

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Performance Record:

_____ *Completed an automated general ledger problem and an automated payroll accounting problem using a microcomputer.

*Indicates core/essential objective

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INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 10 Unit Title: Computerized Filing

Objective: *Upon completion of this unit, the student will use available software to input personal, business and organizational names in proper indexing order and produce an alphabetical list.

*Indicates core/essential objective

Suggested Instructional Practices:

Introduce indexing procedures and filing rules.
Provide drills for applications.

Suggested Resources:

Primary Source: Filing textbook and appropriate data base, spreadsheet or wordprocessing software

Additional Sources: Harry R. Moon. Update on Information Processing Handout: Class Project on ARMA. New York, New York: John Wiley & Sons, Inc. 1987.
Joseph S. Fosegan. Alphabetic Indexing Rules. Cincinnati, Ohio: South-Western Publishing Company. 1984.
Filing simulations.

Evaluation and Suggested Minimum Performance Standards:

*The student will use available software to input personal, business and organizational names in proper indexing order and produce an alphabetical list of each with at least 70% accuracy.

*Indicates core/essential objective

Performance Record:

_____ *Indexed and printed an alphabetical list of personal, business, and organization names.

*Indicates core/essential objective

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INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 11 Unit Title: Introduction to BASIC Programming

Objective: *Upon completion of this unit, the student will write and run a simple program using BASIC statements.

*Indicates core/essential objective

Suggested Instructional Practices:

Introduce the BASIC language.
Provide exercises and sample programs.

Suggested Resources:

Primary Source: BASIC textbooks

Additional Sources: Ellen Richman. Spotlight on Computer Literacy. New York, NY: Random House School. 1985.
Clark and Lambrecht. Information Processing: Concepts, Principles and Procedures. Cincinnati, Ohio: South-Western Publishing Co. 1985.
Francis G. French, Zaney P. Jackobs, William J. Moulds, and Jacob G. Schuchman. Beginning Computer Programming. Boston, MA: Allyn & Bacon, Inc. 1984.
Richard O. Kratzer. A Self-Teaching Guide to BASIC. Portland, Maine: J. Weston Walch, Publisher. 1985.
Clark and Drum. Structured Basic. Cincinnati, Ohio: South-Western Publishing Company. 1983.

Evaluation and Suggested Minimum Performance Standards:

*The student will write and run a simple program using BASIC statements with at least 70% accuracy. The following terms and statements will be included:

1. CLS
2. New
3. Rem
4. Print
5. Let
6. Input
7. Data
8. Read
9. If Then
10. GoTo

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11. End
12. Save
13. List
14. Load

*Indicates core/essential objective

Performance Record:

_____ *The student designed and ran a simple BASIC program.

*Indicates core/essential objective

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 12 Unit Title: Computerized Financial Applications

Objective: Upon completion of this unit, the student will:

*1. complete banking applications on the computer.
*2. prepare a budget on the computer with a spreadsheet program.
*3. complete a payroll problem with spreadsheet, data base, or payroll software.

*Indicates core/essential objectives

Suggested Instructional Practices:

Provide instruction on financial procedures.
Assign exercises to be done manually and on the computer.

Suggested Resources:

Primary Source: Spreadsheet software

Additional Sources: H. Mark Lovern. Calculator Applications for Business Careers. Cincinnati, Ohio: South-Western Publishing Company. 1982.
Basic Life Skills. East Texas State University: Occupational Curriculum Laboratory. 1981.
Accounting/recordkeeping textbooks/workbooks and computerized simulations.
Guest Speakers from local banks
Field trip to local banks
Steven L. Mandell. Working With Applications Software. St. Paul, MN: West Publishing Co. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1: The student will complete a banking application on the computer with at least 70% accuracy.
*Objective 2: The student will prepare a budget on the computer with a spreadsheet program with at least 70% accuracy.
*Objective 3: The student will complete a payroll problem using spreadsheet, data base or payroll software with at least 70% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Completed a banking application on the computer.
_____ *2. Prepared a budget.
_____ *3. Completed a payroll problem.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 13 Unit Title: Electronic Communications

Objective: *Upon completion of this unit, the student will demonstrate the use of electronic communications by transmitting and receiving specified information.

*Indicates core/essential objective

Suggested Instructional Practices:

Instruction and applications

Suggested Resources:

Primary Source: Electronic communications software

Additional Sources: Steven L. Mandell. *Working with Application software*. St. Paul, Minnesota: West Publishing Company. 1986.
Software: First Choice, PFS, Deskmate PC-Talk, Assistant Series, etc.

Evaluation and Suggested Minimum Performance Standards:

*The student will transmit and receive information using a communications simulation program with at least 70% accuracy.

*Indicates core/essential objective

Performance Record:

_____*Transmitted and received information on the computer.

*Indicates core/essential objective

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INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Business Computer Applications

Unit No.: 14 Unit Title: Job Application Process

Objectives: Upon completion of this unit, the student will:

*1. prepare in typewritten form a
    a. personal data sheet.
    b. letter of application.
    c. job application form.
    d. follow-up letter.
    e. letter of resignation.
*2. identify possible sources of job placement.
*3. conduct him/herself appropriately on a personal interview for a job.

*Indicates core/essential objectives

Suggested Instructional Practices:

Discuss career opportunities.
Identify and/or research job openings utilizing resources (Job Bank, newspapers, resource people, etc.)
Lecture and discuss job application procedures.
Prepare a letter of application and resume for a computer-related position.

Suggested Resources:

Primary Source: Elaine Burrow. General Clerical Duties and Related Information. East Texas State University: Occupational Curriculum Laboratory. 1981.

Additional Sources: Robert Zedlitz. Getting A Job. Cincinnati, Ohio: South-Western Publishing Co. 1987
Durwin Hohhertz. Job Related Instruction for Cooperative Part-time Training: Coordinator's Guide. Austin, Texas: East Texas State University. 1981.
Newspaper
Application forms
Films (R/CU):
  Your Job: Applying For It
  How Do You Get There?
  Your Job: Good Work Habits
  Careers in Business and Office Occupations
Transparencies (R/CU):
  Career Planning
  You and Your Occupation
Video tape equipment and tapes

Mississippi State Bureau of Vocational and Technical Education. Handbook for Mississippi Chapter of Future Business Leaders of America. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1987.

Mississippi State Bureau for Vocational and Technical Education. Activities and Resources Handbook. Mississippi State, Mississippi: Research and Curriculum Unit for Vocational and Technical Education. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Letters and data sheet must meet the following criteria:
- a. clear and concise presentation of facts with logical arrangement.
- b. correct use of grammar and punctuation, correct spelling, and acceptable typewritten format.

*Objective 2. Job application form must meet the following criteria:
- a. clear and concise presentation of facts.
- b. neatness and legibility.

*Objective 3. Conduct for a job interview must meet the following criteria:
- a. proper greeting, introduction, and closing.
- b. poise and maturity.
- c. attitude and interest.
- d. communications skills (grammar, speech, voice).
- e. demonstration of initiative, self-confidence, and assertiveness.
- f. presentation of facts in an orderly manner.
- g. career knowledge and career plans.
- h. qualifications for job.
- i. personal appearance (grooming and attire).

*Indicates core/essential objectives

Performance Record:

____ *1. Prepared a personal data sheet.
____ *2. Prepared a letter of application.
____ *3. Prepared a job application form.
____ *4. Prepared a follow-up letter.
____ *5. Prepared a letter of resignation
____ *6. Identified possible sources of job placement.
____ *7. Conducted him/herself appropriately on a personal interview for a job.

*Indicates core/essential objectives

COMPUTER PROGRAMMING TECHNOLOGY I

COURSE GUIDE

Developed by

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Joan Prahal, DeSoto County Vocational Center

Team Leader

Jean T. Henson, Research and Curriculum Unit

COURSE OUTLINE

COMPUTER PROGRAMMING TECHNOLOGY I

Unit No.	Title
1	Introduction, Importance, and Uses
2	History
3	Hardware
4	Software
5	Data Organization
6	Computer Operations
7	BASIC Language Syntax and Programming Applications
8	Evaluation of Purchased Software
9	Occupations and Personal Improvement

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology I

Unit No.: 1 Unit Title: Introduction, Importance, and Uses

Core Objectives: Upon completion of this unit, the student will:

1. prove the statement, "The lives of everyone are affected by computers."
2. define data processing and identify the concepts contained therein.
3. recognize legal and ethical implication of computer use.
4. identify and use periodical and text literature for computer research and reports.

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Computer textbook

Additional sources: Shelly, Cashman, and Forsythe. *Introduction to Data Processing and Computer Fundamentals*.
S. J. Wanous, Gerald W. Wagner, Judith J. Lambrecht. *Fundamentals of Data Processing*. Cincinnati, Ohio: South-Western Publishing Co. 1971.
S. J. Wanous, Gerald W. Wagner, Judith J. Lambrecht. *Fundamentals of Data Processing*. Cincinnati, Ohio: South-Western Publishing Co. 1981.
Levi Reiss. *Computer Literacy*. PWS Publishers, 1984.
Grace Murray Hopper and Steven L. Mandell. *Understanding Computers*. West Publishing Co. 1984.
Donald H. Sanders. *Computers Today Second Edition*. New York, NY: McGraw-Hill Book Company. 1985.
James F. Clark, Judith J. Lambrecht. *Information Processing*. Cincinnati, Ohio: South-Western Publishing Co. 1985.
Gary B. Shelly and Thomas J. Cashman. *Introduction To Computers and Data Processing*. Anaheim Publishing Company. 1980.

Evaluation and Suggested Minimum Performance Standards:

Objective 1. Prove the statement, "The lives of everyone are affected by computers" by identifying (1) computer and (2) systems simulation and/or by listing 100 uses of the computer with at least 69% accuracy and 69 uses.

Objective 2. Define data processing and identify the concepts contained therein with at least 69% accuracy. Answers should include the following terms: calculating, coding (classifying), communicating, recording, retrieving, sorting, storing, summarizing, data processing, data, information, computer, input, input medium, original data, output, input medium, original data, output, output medium, raw data, source document, and information processing.

Objective 3. Recognize legal and ethical implication of computer use by listing 3 legal and ethical uses of the computer and computer software and 2 illegal and unethical uses of the computer and computer software with at least 69% accuracy.

Objective 4. Identify and use periodical and text literature for computer research and reports (written and/or oral) at least 8 times per year with at least 69% accuracy. Reports must exhibit proper source recognition, notebook ready, accuracy, current information.

Performance Record:

_____ 1. Proved the statement, "The lives of everyone are affected by computers."

_____ 2. Defined data processing and identify the concepts contained therein.

_____ 3. Recognized legal and ethical implication of computer use.

_____ 4. Identified and used periodical and text literature for computer research and reports.

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology I

Unit No.: 2 Unit Title: History

Core Objectives: Upon completion of this unit, the student will:

1. identify machines, concepts, dates, places, and/or persons associated with the history of computers.
2. identify basic definitions pertaining to the history and uses of computers.

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Computer textbook

Additional sources: Shelly, Cashman, and Forsythe. Introduction to Data Processing and Computer Fundamentals.

S. J. Wanous, Gerald W. Wagner, Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.

S. J. Wanous, Gerald W. Wagner, Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

Levi Reiss. Computer Literacy. PWS Publishers, 1984.

Grace Murray Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co. 1984.

Donald H. Sanders. Computers Today Second Edition. New York, NY: McGraw-Hill Book Company. 1985.

James F. Clark, Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.

Gary B. Shelly and Thomas J. Cashman. Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.

Evaluation and Suggested Minimum Performance Standards:

Objective 1. Identify machines, concepts, dates, places, and/or persons associated with the history of computers with at least 69% accuracy. (Finger counting, Abacus, Soraban, Napier's bones, Slide Rule, Blaise Pascal, Gotlfried von Leibnitz, Joseph Jacquard, Charles Babbabe, Charles Xavier Thomas, Boolean Algebra, Frank

S. Baldwin, Door Eugene Felt & William S. Burroughs, IBM, Herman Hollerith, James Powers, Mark I, ENIAC, EDSAC, John von Neumann, UNIVAC, 1956, 1959, transistors, photolithography, Ted Hoff)

Objective 2. Identify basic definitions pertaining to the history and uses of computers with at least 69% accuracy. (Online-realtime, symbolic logic, stored program, transistor, vacuum tube, integrated circuit, silicon chip, K, microprocessor, compiler language)

Performance Record:

_____ 1. Identified machines, concepts, dates, places, and/or persons associated with the history of computers.
_____ 2. Identified basic definitions pertaining to the history and uses of computers.

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology I

Unit No.: 3 Unit Title: Hardware

Core Objectives: Upon completion of this unit, the student will:

*1. Identify basic terms pertaining to computer hardware.
*2. Identify distinctive features of computers.
3. Identify the generations of computers and identify their characteristics.
*4. Identify hardware for control, internal storage, and computation and/or identify computer classification by size.
*5. Identify hardware, media, and terms related to input of data.
*6. Identify internal (primary) storage, supplementary storage, off-line storage, and on-line storage.
*7. Identify hardware, media, and terms related to output of information.
*8. Identify various peripheral hardware.
*9. Identify hardware, media, and terms related to mass data storage.

*Indicates core/essential objectives.

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Computer textbook

Additional sources: Shelly, Cashman, and Forsythe. Introduction to Data Processing and Computer Fundamentals.
S. J. Wanous, Gerald W. Wagner, Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.
S. J. Wanous, Gerald W. Wagner, Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.
Levi Reiss. Computer Literacy. PWS Publishers, 1984.
Grace Murray Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co. 1984.
Donald H. Sanders. Computers Today Second Edition. New York, NY: McGraw-Hill Book Company. 1985.
James F. Clark, Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.

Gary B. Shelly and Thomas J. Cashman. *Introduction To Computers and Data Processing*. Anaheim Publishing Company. 1980.

Manufacturer's manuals for computers in lab and for software used.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Identify basic terms pertaining to computer hardware with at least 69% accuracy. (Millisecond, Nanosecond, works with numbers or letters, two types of computers, characteristics of digital computers, hardware, data, information, information processing, system, information system, output, input, processing, raw data, computer, source document, microcomputer, supercomputer, minicomputer.

*Objective 2. Identify 4 distinctive features of computers with at least 69% accuracy.

Objective 3. Identify the generations of computers and identify their characteristics with at least 69% accuracy.

*Objective 4. Identify hardware for control, internal storage, and computation and/or identify computer classification by size with at least 69% accuracy. (functions performed in any computer center, three units of the CPU, internal storage unit, computer, integrated circuit, central processor, Cpu, memory, processor, minicomputer, megahertz, EEPROM, RAM, byte, volatile memory, ROM, PROM, nonvolatile memory, control unit, CP, microcomputer, arithmetic logic unit, mainframe, central processor unit, supercomputer, microprocessor, megabyte, IC, main storage, K, EPROM, numeric address.

*Objective 5. Identify hardware, media, and terms related to input of data with at least 69% accuracy. (EBCDIC Code, cursor, ASCII, ergonomic, interactive, media, matrix, Universal Product Code [UPC], input [noun], input [verb])

*Objective 6. Identify internal (primary) storage, supplementary storage, off-line storage, and on-line storage with at least 69% accuracy.

*Objective 7. Identify hardware, media, and terms related to output of information with at least 69% accuracy. (Monochrome, graphic, output [noun], output [verb], memory-mapped, high-resolution graphics, pixels, impact printer, nonimpact printer, dot matrix, printhead, ink-jet printer, chain printer, laser printer, interface, serial, parallel, speech synthesizer, computer output microfilm, microfiche, plotter, real-time controller, robot, letter quality printer)

*Objective 8. Identify 5 pieces of peripheral hardware with at least 69% accuracy.

*Objective 9. Identify 5 pieces of hardware, media, and terms related to mass data storage with at least 69% accuracy. (magnetic tape, magnetic disk, disk pack, on-line storage, off-line, random access, sequential access, track, direct access, flexible disk, sector, hard disk, cylinder, channel, bubble memory, laser disk, diskette, floppy disk, paper tape, punched card)

*Indicates core/essential objectives.

Performance Record:

_____ *1. Identified basic terms pertaining to computer hardware.
_____ *2. Identified distinctive features of computers.
_____ 3. Identified the generations of computers and/or identified their characteristics.
_____ *4. Identified hardware for control, internal storage, and computation and/or identify computer classification by size.
_____ *5. Identified hardware, media, and terms related to input of data.
_____ *6. Identified internal (primary) storage, supplementary storage, off-line storage, and on-line storage.
_____ *7. Identified hardware, media, and terms related to output of information.
_____ *8. Identified various peripheral hardware.
_____ *9. Identified hardware, media, and terms related to mass data storage.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Title: Computer Programming Technology I

Unit No.: 4 Unit Title: Software

Core Objectives: Upon completion of this unit, the student will:

*1. Identify terminology pertaining to support software.
*2. Identify the fundamental characteristics of a program.
*3. Identify the applied steps in writing and running a program.
*4. Identify various programming languages and/or their type.
*5. Identify facts pertaining to the history and characteristics of COBOL, FORTRAN, BASIC, PASCAL, and/or RPG.
*6. Identify and use flowchart symbols and/or pseudocode specifications in various flowcharting and/or pseudocode applications.
*7. Identify differences and similarities of compiler and assembler languages.
8. Identify and/or utilize source documents and/or the role they play.
*9. Identify the 4 basic components of the basic computer system.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Computer textbook

Additional sources: Shelly, Cashman, and Forsythe. Introduction to Data Processing and Computer Fundamentals.
S. J. Wanous, Gerald W. Wagner, Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.
S. J. Wanous, Gerald W. Wagner, Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.
Levi Reiss. Computer Literacy. PWS Publishers, 1984.
Grace Murray Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co. 1984.
Donald H. Sanders. Computers Today Second Edition. New York, NY: McGraw-Hill Book Company. 1985.
James F. Clark, Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.

Gary B. Shelly and Thomas J. Cashman. Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.

Manufacturer's manuals for computers in lab and for software used.

Manufacturer's manuals for computers in lab and software used

Standard Honeywell Template Manual; Honeywell, Inc.

Flowchart Template; Honeywell, Inc.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Identify terminology pertaining to support software with at least 69% accuracy. (program [noun], programmer, software, program [verb]. input [noun], input [verb], output [noun], output [verb], flowchart, algorithm or algorism, characteristics of an algorithm, machine language, grace hopper, compiler language, 3 parts of compiler language, subroutine, source program, object program, syntax, pseudocode, coding, hierarchy chart, module, structured programming, top-down design, menu, problem, debugging, documentation, copyright, canned software, systems software, operating system, utility program, boot up, catalog, directory, applications software, report spacing chart, custom-written software, machine language, assembly language, assembler, high-level language, interpreter program, compiler program)

*Objective 2. Identify 4 fundamental characteristics of a program with at least 69% accuracy.

*Objective 3. Identify 8 applied steps in writing and running a program with at least 69% accuracy.

*Objective 4. Identify 5 programming languages and/or their their type with at least 69% accuracy.

*Objective 5. Identify 5 facts pertaining to the history and characteristics of COBOL, FORTRAN, BASIC, PASCAL, and/or RPG with at least 69% accuracy.

*Objective 6. Identify and use flowchart symbols and/or pseudocode specifications in 4 flowcharting and/or pseudocode applications with at least 69% accuracy.

*Objective 7. Identify 3 differences and/or similarities of compiler and assembler languages with at least 69% accuracy.

Objective 8. Identify and/or utilize 3 source documents and/or the role they play with at least 69% accuracy.

*Objective 9. Identify the 4 basic components of a computer system with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Identified terminology pertaining to support software.

_____ *2. Identified the fundamental characteristics of a program.

_____ *3. Identified the applied steps in writing and running a program.

_____ *4. Identified various programming languages and/or their type.

_____ *5. Identified facts pertaining to the history and characteristics of COBOL, FORTRAN, BASIC, PASCAL, and/or RPG.

_____ *6. Identified and use flowchart symbols and/or pseudocode specifications in various flowcharting applications.

_____ *7. Identified differences and/or similarities of compiler and assembler languages.

_____ 8. Identified and/or utilize source documents and/or the role they play.

_____ *9. Identified the 4 basic components of the basic computer system.

*indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology I

Unit No.: 5 Unit Title: Data Organization

Core Objectives: Upon completion of this unit, the student will:

1. Identify facts pertaining to the punched card.
2. Identify with regard to cards: field, unit record, file, and character or byte.
3. Identify with regard to cards: master record, detail record, summary record, balance records, and program card.
4. Identify various basic punched card unit record machines and the basic function each performed (key-driven card punch, card verifier, card sorter, alphabetic interpreter, reproducing punch).
5. Plan and layout a card.
6. Identify with regard to cards: master, detail, summary, and balance file.
7. Recognize that the punched card unit record system has analogies in the magnetic unit record system and name these.
8. Differentiate between magnetic tape and magnetic disks and how data is stored on each.
9. Identify differences/similarities pertaining to programming punched card unit record machines versus programming magnetic unit record machines.
10. Define terms, give examples, and put in order from small to large those terms which characterize data.

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source:

Additional sources: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.

Levi Reiss. Computer Literacy. PWS Publishers. 1984.

Grace Murray, Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co., 1984.

Donald H. Sanders, Computers Today. 2nd Edition. New York, NY: McGraw-Hill Book Company. 1985.

James F. Clark and Judith J. Lambrecht,
Information Processing. Cincinnati, Ohio:
South-Western Publishing Co. 1985.
Gary B. Shelly, Thomas J. Cashman.
Introduction To Computers and Data
Processing. Anaheim Publishing Company. 1980.
Manufacturer's manuals for computers in lab and
for software used.

Evaluation and Suggested Minimum Performance Standards:

Objective 1. Identify facts pertaining to the punched card with at least 69% accuracy. (key-driven card punch, Herman Hollerith, IBM, card field, card verifier, binary code, column (card), digit, eleven position, nine edge, proxy, row (card), twelve edge, twelve position, X position, Y position, zone punch, numeric punches, columns numbers and order, row numbers and order, number of punches in a column for alphabetic characters, number of punches in a column for numeric characters, number of punches in a column for special characters, corner cut)

Objective 2. Identify with regard to cards: field, unit record, file, and character or byte with at least 69% accuracy.

Objective 3. Identify with regard to cards: master record, detail record, summary record, balance records, and program card with at least 69% accuracy.

Objective 4. Identify 5 basic punched card unit record machines and the basic function each performed (key-driven card punch, card verifier, card sorter, alphabetic interpreter, reproducing punch) with at least 69% accuracy.

Objective 5. Given a verbal and/or written application, plan and layout a card with at least 69% accuracy.

Objective 6. Identify with regard to cards: master, detail, summary, and balance file with at least 69% accuracy.

Objective 7. Recognize that the punched card unit record system has analogies in the magnetic unit record system and name these in writing and/or by illustration with at least 69% accuracy.

Objective 8. Differentiate between magnetic tape and magnetic disks and how data is stored on each matching these to illustrations and/or by drawing complete illustrations of each of these showing media characteristics, fields, records, and bytes with at least 69% accuracy.

Objective 9. Identify differences/similarities pertaining to programming punched card unit record machines versus programming magnetic unit record machines by illustration and/or by listing 3 or each with at least 69% accuracy.

Objective 10. Define terms, give examples, and put in order from small to large those terms which characterize data with at least 69% accuracy.

Performance Record:

_____ 1. Identified facts pertaining to the punched card.
_____ 2. Identified with regard to cards: field, unit record, file, and character or byte.
_____ 3. Identified with regard to cards: master record, detail record, summary record, balance records, and program record.
_____ 4. Identified various basic punched card unit record machines and the basic function each performed (key-driven card punch, card verifier, card sorter, alphabetic interpreter, reproducing punch).
_____ 5. Planned and laid out a card.
_____ 6. Identified with regard to cards: master, detail, summary, and balance file.
_____ 7. Recognized that the punched card unit record system has analogies in the magnetic unit record system and name these.
_____ 8. Differentiated between magnetic tape and magnetic disks and how data is stored on each.
_____ 9. Identified differences/similarities pertaining to programming punched card unit record machines versus programming magnetic unit record machines.
_____ 10. Defined terms, gave examples, and put in order from small to large those terms which characterize data.

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology I

Unit No.: 6 Unit: Computer Operations

Core Objectives: Upon completion of this unit, the student will:

*1. recognize and utilize the computer system to be used--its hardware configuration and characteristics.
*2. illustrate for character printers: power-on, load paper, line feed, form feed, and operations.
*3. illustrate for disk drives: power-on, load diskettes, unload diskettes, and opening/closing disk drive door correctly.
*4. differentiate between internal memory and auxiliary storage.
*5. identify and use correctly all keys on the keyboard (letters, numbers, graphics, special purpose, punctuation).
*6. operate computer and run programs.
*7. recognize facts/handling techniques pertaining to diskettes.
*8. perform operations on diskettes such as formatting, copying diskettes, comparing diskettes, copying a file, comparing a file, and displaying a directory.
*9. identify online-realtime computer systems.
*10. illustrate how a mainframe/minicomputer with emulating PCs represents an online-realtime system.
*11. recognize that the mainframe/mini computer uses a hard fixed disk for mass data storage and also that it uses diskettes for auxiliary storage and has internal memory.
*12. recognize how to run programs from mainframe/mini computers via emulating PCs and display work stations.
*13. differentiate between sequential and random access files.
*14. plan magnetic tape records.
*15. plan magnetic disk records.
*16. identify sequencing.
*17. identify selecting.
*18. identify merging.
*19. identify matching.
*20. identify match-merging.
*21. identify sequence-checking.
*22. identify utility programs and identify some of the routine jobs performed by them.
*23. identify application program, who wrote it, and for what type jobs.
*24. identify systems software and/or identify some of its functions.
*25. identify operating system, list several together with their developer(s) and/or some of their characteristics.
*26. demonstrate proper care and user responsibility in operating computer hardware.
*27. identify computer related devices/materials and/or state reasonable costs for each.
*28. demonstrate correct keyboarding skills as appropriate for grade level.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Computer manuals from manufacturers of computers

Additional sources:
- S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. *Fundamentals of Data Processing*. Cincinnati, Ohio: South-Western Publishing Co. 1981.
- S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. *Fundamentals of Data Processing*. Cincinnati, Ohio: South-Western Publishing Co. 1971.
- Levi Reiss. *Computer Literacy*. PWS Publishers. 1984.
- Grace Murray, Hopper, and Steven L. Mandell. *Understanding Computers*. West Publishing Co., 1984.
- Donald H. Sanders, *Computers Today*. 2nd Edition. New York, NY: McGraw-Hill Book Company. 1985.
- James F. Clark and Judith J. Lambrecht, *Information Processing*. Cincinnati, Ohio: South-Western Publishing Co. 1985.
- Gary B. Shelly, Thomas J. Cashman. *Introduction To Computers and Data Processing*. Anaheim Publishing Company. 1980.
- Manufacturer's manuals for computers in lab and for software used.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Recognize and utilize the computer system to be used --its hardware configuration and characteristics by running at least twice the computer manufacturer's tutorial for the computer system to be used and/or based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 2. Illustrate for character printers: power-on, load paper, line feed, form feed, and operations based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 3. Illustrate for disk drives: power-on, load diskettes, unload diskettes, and opening/closing disk drive doors correctly based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 4. Differentiate between internal memory and auxiliary storage with at least 69% accuracy.

*Objective 5. Identify and use correctly all keys on the keyboard (letters, numbers, graphics, special purpose, punctuation) based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 6. Operate computer and run programs by loading and running 3 programs (tutorial and/or games) based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 7. Recognize facts/handling techniques pertaining to diskettes based on rating scale (attached) with at least 69% accuracy.

*Objective 8. Perform operations on diskettes such as formatting, copying diskettes, comparing diskettes, copying a file, comparing a file, and displaying a directory based on rating scale (attached) with at least 69% accuracy.

*Objective 9. Identify online-realtime computer systems with at least 69% accuracy.

*Objective 10. Illustrate how a mainframe/minicomputer represents an online-realtime system by drawing and verbal/written comments with at least 69% accuracy.

*Objective 11. Recognize that the mainframe/minicomputer uses a hard fixed disk for mass data storage and also that it uses diskettes for auxiliary storage and has internal memory with at least 69% accuracy.

*Objective 12. Recognize how to run programs from mainframe/mini computers via emulating PCs and display work stations by adding more details to drawing and comments originated in Objective 10 with at least 69% accuracy.

*Objective 13. Differentiate between sequential and random access files with at least 69% accuracy.

*Objective 14. Given an application, plan magnetic tape records with at least 69% accuracy.

*Objective 15. Given an application, plan magnetic disk records with at least 69% accuracy.

*Objective 16. Identify sequencing by identifying 3 examples of it with at least 69% accuracy.

*Objective 17. Identify selecting by identifying 3 examples of it with at least 69% accuracy.

*Objective 18. Identify merging by identifying 3 examples of it with at least 69% accuracy.

*Objective 19. Identify matching by identifying 3 examples of it with at least 69% accuracy.

*Objective 20. Identify match-merging by identifying 3 examples of it with at least 69% accuracy.

*Objective 21. Identify sequence-checking by identifying 3 examples of it with at least 69% accuracy.

*Objective 22. Identify utility programs and identify 3 of the routine jobs performed by them with at least 69% accuracy.

*Objective 23. Identify application program, who wrote it, and for what type jobs with at least 69% accuracy.

*Objective 24. Identify systems software and/or identify 3 of its functions with at least 69% accuracy.

*Objective 25. Identify operating system, list 3 together with their developer(s) and/or one of their characteristics with at least 69% accuracy.

*Objective 26. Demonstrate proper care and user responsibility in operating computer hardware based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 27. Identify 5 computer related devices/materials and/or state reasonable costs for each with at least 69% accuracy.

*Objective 28. Demonstrate correct keyboarding skills as appropriate for grade level based on teacher rating scale (attached) with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Recognized and utilized the computer system to be used--its hardware configuration and characteristics.
_____ *2. Illustrated for character printers: power-on, load paper, line feed, form feed, and operations.
_____ *3. Illustrated for disk drives: power-on, load diskettes, unload diskettes and opening/closing drive doors correctly.
_____ *4. Differentiated between internal memory and auxiliary storage.
_____ *5. Identified and used correctly all keys on the keyboard (letters, numbers, graphics, special purpose, punctuation).
_____ *6. Operated computer and ran programs.
_____ *7. Recognized facts/handling techniques pertaining to diskettes.
_____ *8. Performed operations on diskettes such as formatting, copying diskettes, comparing diskettes, copying a file, comparing a file, and displaying a directory.
_____ *9. Identified online-realtime computer systems.
_____ *10. Illustrated how a mainframe/minicomputer with emulating PCs represents an online-realtime system.
_____ *11. Recognized that the mainframe/minicomputer uses a hard fixed disk for mass data storage and also that it uses diskettes for auxiliary storage and has internal memory.
_____ *12. Recognized how to run programs from mainframe/mini computers via emulating PCs and display work stations.
_____ *13. Differentiated between sequential and random access files.
_____ *14. Planed magnetic tape records.
_____ *15. Planed magnetic disk records.
_____ *16. Identified sequencing.
_____ *17. Identified selecting.
_____ *18. Identified merging.
_____ *19. Identified matching.
_____ *20. Identified match-merging.
_____ *21. Identified sequence-checking.
_____ *22. Identified utility programs and identified some of the routine jobs performed by them.
_____ *23. Identified application program, who writes it, and for what type jobs.

_____*24. Identified systems software and/or some of its functions.

_____*25. Identified operating system, listed several together with their developer(s) and/or some of their characteristics.

_____*26. Demonstrated proper care and user responsibility in operating computer hardware.

_____*27. Identified computer related devices/materials and/or stated reasonable costs for each.

_____*28. Demonstrated correct keyboarding skills as appropriate for grade level.

*Indicates core/essential objectives

UNIT 6 - OBJECTIVE 1

COMPUTER SYSTEM EVALUATION

GRADE SCALE FOR COMPUTER SYSTEM EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

COMPUTER SYSTEM EVALUATION

NAME ______________________________ COURSE ________________________________

INSTITUTION ___________________________________ DATE ______________________

PROBLEM TITLE ___________________________ BOOK ___________________ PAGE ___

POINTED OUT	SCORE
Color Monitor	
Monochrome Monitor	
Diskdrive A	
Diskdrive B	
On/off switch for color monitor	
Off position for switch on system	
On position for switch on system	
Correct settings for switches to control brightness, etc. on monitors	
Printers with on/off switch settings	
TOTAL POINTS	
NUMBER/LETTER GRADE	

UNIT 6 - OBJECTIVE 2

CHARACTER PRINTER EVALUATION

GRADE SCALE FOR CHARACTER PRINTER EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

CHARACTER PRINTER EVALUATION

NAME ______________________________ COURSE ________________________________

INSTITUTION ___________________________________ DATE ______________________

PROBLEM TITLE ___________________________ BOOK ___________________ PAGE ___

OPERATION	SCORE
Power on	
Load paper	
Set paper at head of form	
Online switch on	
Online switch off	
Line feed	
Form feed	
Print from computer	
Tear printed copy off	
TOTAL POINTS	
NUMBER/LETTER GRADE	

UNIT 6 - OBJECTIVE 3

DISK DRIVE EVALUATION

GRADE SCALE FOR DISK DRIVE EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

DISK DRIVE EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

OPERATION	SCORE
Power on	
Load diskette into drive	
Close diskette drive door	
Open diskette drive door	
Unload diskette from drive	
Power off	
TOTAL POINTS	
NUMBER/LETTER GRADE	

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UNIT 6 - OBJECTIVE 5

KEYBOARD EVALUATION

GRADE SCALE FOR KEYBOARD EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

KEYBOARD EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________

PROBLEM TITLE ______________________ BOOK ______________ PAGE ___

IDENTIFIED	SCORE
Alphabetic character keys	
Numeric character keys	
Function keys	
Punctuation keys	
Special purpose keys	
USED CORRECTLY	
Alphabetic character keys	
Numeric character keys	
Function keys	
Punctuation keys	
Special purpose keys	
TOTAL POINTS/NUMBER/LETTER GRADE	

UNIT 6 - OBJECTIVE 6

COMPUTER OPERATIONS EVALUATION

GRADE SCALE FOR COMPUTER OPERATIONS EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

COMPUTER OPERATIONS EVALUATION

NAME ______________________________ COURSE ______________________________

INSTITUTION ______________________________ DATE ____________________

PROBLEM TITLE ______________________ BOOK ________________ PAGE ___

OPERATION	SCORE				
Load DOS or IPLable					
Load program diskette					
Power on					
Display directory					
Load program					
Run program					
Correctly terminate program					
Unload program diskette					
Power off					
TOTAL POINTS/PROGRAM					
TOTAL POINTS ALL PROGRAMS					
NUMBER/LETTER GRADE					

UNIT 6 - OBJECTIVE 7

DISKETTE FACT/HANDLING TECHNIQUE EVALUATION

GRADE SCALE FOR DISKETTE FACT/HANDLING TECHNIQUE EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

DISKETTE FACT/HANDLING TECHNIQUE EVALUATION

NAME ______________________________ COURSE ______________________________

INSTITUTION ______________________________ DATE ____________________

PROBLEM TITLE __________________________ BOOK __________________ PAGE ___

FACT/HANDLING TECHNIQUE	SCORE			
Held only where label is located				
Diskette surface is never touched				
Loaded into drive only when red light is off				
Unloaded from drive only when red light is off				
Diskette is inserted into drive gently				
Diskette is always returned to its protective envelope when not in use				
Diskette is protected from dust, dirt, heat, cold, water, direct sunlight, smoke, and magnetic materials				
Diskette is never bent or folded				
Label on diskette is written on only with felt tip pen				
Paper clips or rubber bands are never put around disks				
Erasers are never used on diskettes				
TOTAL POINTS/OBSERVATION				
NUMBER/LETTER GRADE/OBSERVATION, FINAL NUMBER/LETTER GR.				
FINAL NUMBER/LETTER GRADE				

UNIT 6 - OBJECTIVE 8

OPERATIONS ON DISKETTES

GRADE SCALE FOR OPERATIONS ON DISKETTES EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

OPERATIONS ON DISKETTES EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ______________________ BOOK ______________ PAGE ___

OPERATION	SCORE
FORMAT DISKETTE	
COPYING A DISKETTE	
COMPARING DISKETTES	
COPYING A FILE	
COMPARING FILES	
DISPLAY A DIRECTORY	
TOTAL POINTS	
LETTER GRADE	

UNIT 6 - OBJECTIVE 26

OPERATIONS CARE/USER RESPONSIBILITY EVALUATION

GRADE SCALE FOR OPERATIONS CARE/USER RESPONSIBILITY EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

OPERATIONS CARE/USER RESPONSIBILITY EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

ITEM	SCORE				
No horseplay around hardware					
No food or drink brought around hardware					
Operates hardware gently and smoothly					
Operates hardware only after operation instructions have been given					
Calls teacher attention when malfunction of hardware arises to get assistance					
Exhibits proper operation/cleaning techniques of hardware					
Powers off hardware when finished using					
Uses manuals when question arises					
Returns manuals to proper place when finished using					
TOTAL POINTS/OBSERVATION					
NUMBER/LETTER GRADE/OBSERVATION, FINAL NUMBER/LETTER GR.					
FINAL NUMBER/LETTER GRADE					

UNIT 6 - OBJECTIVE 28

KEYBOARDING SKILL EVALUATION

GRADE SCALE FOR KEYBOARDING SKILL EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

KEYBOARDING SKILL EVALUATION

NAME ______________________________ COURSE ________________________________

INSTITUTION ___________________________________ DATE ______________________

PROBLEM TITLE ___________________________ BOOK ___________________ PAGE ___

SKILL	SCORE			
Keeps correct fingers on home row keys				
Keeps eyes on document to be keyed				
Uses correct fingers for different keys				
Seeks speed with correctness				
Speed with correctness is OK for grade level				
Uses numeric keypad correctly				
Uses function keys correctly				
TOTAL POINTS/OBSERVATION				
NUMBER/LETTER GRADE/OBSERVATION				
FINAL NUMBER/LETTER GRADE				

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology I

Unit No.: 7 Unit: BASIC Language Syntax and Programming Applications

Core Objectives: Upon completion of this course, the student will:

*1. demonstrate correct usage of the BASIC Language's (DCUOTBL) input/output statements.
*2. design, flowchart, write, run, and debug (DFWRD) a BASIC program utilizing input/output statements.
*3. DCUOTBL statements to perform arithmetic operations.
*4. DFWRD a BASIC program which will perform almost all arithmetic operations, (Parentheses and raising to a power may be included).
*5. DCUOTBL statements/techniques to document a program and edit a report.
*6. DFWRD a BASIC program which will document a program and edit a report.
*7. DCUOTBL statements for comparing.
*8. DFWRD a BASIC program which will involve comparisons.
*9. DCUOTBL relational operators.
*10. DFWRD a BASIC program which will utilize relational operators.
*11. DCUOTBL statements for implementing simple FOR...NEXT...Loops.
*12. DFWRD a BASIC program which will involve simple FOR...NEXT... LOOPS.
*13. DCUOTBL statements for implementing loops, nested loops, and interactive processing.
*14. DFWRD a BASIC program which will involve loops, nested loops, and interactive processing.
*15. DCUOTBL statements to define, load, print, and search an array.
*16. DFWRD a BASIC program involving arrays.
*17. DCUOTBL statements/techniques for establishing and implementing menus.
*18. DFWRD a BASIC program which will involve establishing and utilizing a menu.
*19. DCUOTBL string functions.
*20. DFWRD a BASIC program which will make use of string functions.
*21. DCUOTBL commonly used functions from algebra and trigonometry.
*22. DFWRD a BASIC program which will utilize BASIC functions on algebraic and trigonometric applications.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Computer programming text

Additional source: Gary B. Shelly and Thomas J. Cashman. Introduction to BASIC Programming. Anaheim Publishing Company. 1982.
Donald T. Payne and William R. Beck. IBM BASIC. Prentice-Hall, Inc. 1983.
Manufacturer's manuals for computers in lab and for software used.
Standard Honeywell Template Manual. Honeywell, Inc.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Demonstrate correct usage of the BASIC Language's (DCUOTBL) input/output statements including READ, PRINT, DATA based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 2. Design, flowchart, write, run, and debug (DFWRD) a BASIC program utilizing input/output statements plus IF, GO TO, and END statements according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 3. DCUOTBL statements to perform arithmetic operations including LET used with all arithmetic operations based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 4. DFWRD a BASIC program which will perform almost all arithmetic operations, (Parentheses and raising to a power may be included) according to teacher rating (attached) with at least 69% accuracy.

*Objective 5. DCUOTBL statements/techniques to document a program and edit a report including REM, TAB, SPC, initialization of variables, implementing counters, accumulating totals and effects of various punctuation symbols such as , ; etc. based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 6. DFWRD a BASIC program which will document a program and edit a report according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 7. DCUOTBL statements for comparing including IF .. THEN, based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 8. DFWRD a BASIC program which will involve comparisons according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 9. DCUOTBL relational operators including =, <, >, <=, >=, and <> based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 10. DFWRD a BASIC program which will utilize relational operators according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 11. DCUOTBL statements for implementing simple FOR...NEXT...Loops based upon the computer hardware and software being utilized with at least 69%

accuracy.

*Objective 12. DFWRD programs which will involve simple FOR...NEXT... LOOPS according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 13. DCUOTBL statements for implementing loops, nested loops, and interactive processing including INPUT, nested loops, CLS, input editing, and editing for reasonableness based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 14. DFWRD a BASIC program which will involve loops, nested loops, and interactive processing according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 15. DCUOTBL statements to define, load, print, and search an array including DIM, DATA, FOR .. NEXT, READ, IF .. THEN, PRINT, AND INPUT based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 16. DFWRD a BASIC program involving arrays according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 17. DCUOTBL statements/techniques for establishing and implementing menus including INPUT, ON .. GO TO, GOSUB, RETURN, ON .. GOSUB, FOR .. NEXT, LET, PRINT, AND IF .. THEN based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 18. DFWRD a BASIC program which will involve establishing and utilizing a menu according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 19. DCUOTBL string functions including INKEY$, VAL, LEN, STR$, LEFT$, RIGHT$, MID$, STRING$, CHR$, AND ASC based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 20. DFWRD a BASIC program which will make use of string functions according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 21. DCUOTBL commonly used functions from algebra and trigonometry including RND, SQR, SGN, ATN(X), COS(X), EXP(X), FIX(X), LOG(X), SIN(X), TAN(X), DEF FN, PEEK, AND POKE based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 22. DFWRD a BASIC program which will utilize BASIC functions on algebraic and trigonometric applications according to teacher rating scale (attached) with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Demonstrated correct usage of the BASIC Language's (DCUOTBL) input/output statements.

_____ *2. Designed, flowcharted, wrote, ran, and debugged (DFWRD) a BASIC program utilizing input/output statements.

_____ *3. DCUOTBL statements to perform arithmetic operations.

_____ *4. DFWRD a BASIC program which will perform almost all arithmetic operations, (Parentheses and raising to a power may be included).

_____ *5. DCUOTBL statements/techniques to document a program and edit a report.

_____ *6. DFWRD a BASIC program which will document a program and edit a report.

_____ *7. DCUOTBL statements for comparing.

_____ *8. DFWRD a BASIC program which involved comparisons.

_____ *9. DCUOTBL relational operators.

_____ *10. DFWRD a BASIC program which will utilize relational operators.

_____ *11. DCUOTBL statements for implementing simple FOR...NEXT...Loops.

_____ *12. DFWRD a BASIC program which involved FOR...NEXT...LOOPS.

_____ *13. DCUOTBL statements for implementing loops, nested loops, and interactive processing.

_____ *14. DFWRD a BASIC program which will involve loops, nested loops, and interactive processing.

_____ *15. DCUOTBL statements to define, load, print, and search an array.

_____ *16. DFWRD a BASIC program involving arrays.

_____ *17. DCUOTBL statements/techniques for establishing and implementing menus.

_____ *18. DFWRD a BASIC program which involved establishing and utilizing a menu.

_____ *19. DCUOTBL string functions.

_____ *20. DFWRD a BASIC program which made use of string functions.

_____ *21. DCUOTBL commonly used functions from algebra and trigonometry.

_____ *22. DFWRD a BASIC program which utilized BASIC functions on algebraic and trigonometric applications.

*Indicates core/essential objectives

UNIT 7 - OBJECTIVES 2, 4, 5, 8, 10, 12, 14, 16, 18, 20, 22

GRADE SCALE FOR PROGRAM EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3- NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

NAME ____________________ COURSE ____________________

INSTITUTION ____________________ DATE ____________________

PROGRAM TITLE ____________________ BOOK ____________ PAGE ____

A. TASKS

B. FLOWCHART

- (A) NEATNESS
- (B) FLOW OK
- (C) CORRECT SYMBOLS
- (D) PROPER ALGORITHM TRANSLATION
- (E) REPRESENTS GOOD PROGRAMMING TECHNIQUES
- (F) WORDS IN SYMBOLS OK

C. PROGRAM

- (A) DOCUMENTATION
- (B) READABLE
- (C) REPRESENTS GOOD PROGRAMMING
- (D) ENHANCEMENTS

D. OUTPUT

- (A) GOOD FORM
- (B) ACCURATE
- (C) LIKE PICTURE REQUIREMENT

E. PRESENTATION OF A - D

F. Time required for completion

TOTAL POINTS ____________________ ¦ LETTER GRADE ____________________

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology I

Unit No.: 8 Unit Title: Evaluation of Purchased Software

Core Objectives: Upon completion of this course, the student will:

* 1. define data base and illustrate an application.
* 2. define spreadsheet and illustrate an application.
* 3. define word processing and illustrate an application.
* 4. integrate an application using word processing and data base and/or spreadsheet.
* 5. demonstrate simple usage of electronic communications by transmitting and receiving specified information.

*indicates core/essential objectives.

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional source: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.

Levi Reiss. Computer Literacy. PWS Publishers. 1984.

Grace Murray Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co. 1984.

Donald H. Sanders. Computers Today. 2nd ed. New York, NY: McGraw-Hill Book Co. 1985.

James F. Clark and Judith J. Lambrecht. Information Processing. Anaheim Publishing Company. 1985.

Gary B. Shelly and Thomas J. Cashman. Introduction to Computers and Data Processing. Anaheim Publishing Company. 1980.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Define data base and illustrate an application according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 2. Define spreadsheet and illustrate an application according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 3. Define word processing and illustrate an application according to teacher rating scale (attached) with at at least 69% accuracy.

*Objective 4. Integrate an application using word processing and data base and/or spreadsheet according to teacher rating scale (attached) with at least 70% accuracy.

*Objective 5. demonstrate simple usage of electronic communications by transmitting and receiving specified information using a communications simulation program with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Defined data base and illustrated an application.
_____ *2. Defined spreadsheet and illustrated an application.
_____ *3. Defined word processing and illustrated an application.
_____ *4. Integrated an application using data base and word processing and/or spreadsheet.
_____ *5. Demonstrated simple usage of electronic communications by transmitting and receiving specified information.

*Indicates core/essential objectives

UNIT 8 - OBJECTIVE 1

DATA BASE EVALUATION

GRADE SCALE FOR DATA BASE EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

DATA BASE EVALUATION

NAME ____________________ COURSE ____________________

INSTITUTION ____________________ DATE ______________

PROBLEM TITLE ________________ BOOK ____________ PAGE ___

A. DESIGN A FILE

B. ADD FORMS TO THE FILE

C. EDIT SELECTED FORMS

D. DELETE SELECTED FORMS

E. SELECT CERTAIN FORM(S)

F. GENERATE REPORT(S)

G. PRINT LABELS

H. DETERMINE NO. FORMS
WITH GIVEN CHARACTERISTIC(S)

I. SELECTED FIELDS APPROPRIATELY

TOTAL POINTS ____________________ | LETTER GRADE ____________________

UNIT 8 - OBJECTIVE 2

SPREADSHEET EVALUATION

GRADE SCALE FOR SPREADSHEET EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

SPREADSHEET EVALUATION

NAME ______________________________ COURSE ________________________________

INSTITUTION ___________________________________ DATE ______________________

PROBLEM TITLE ___________________________ BOOK ___________________ PAGE ___

A. COLUMN HEADINGS

B. ROW HEADINGS

C. SET CELL STYLES

D. KEY VALUES IN CELLS

E. CREATE FORMULAS

F. RECALCULATE

G. PRINT

H. SAVE A FILE TO DISK

I. RETRIEVE A FILE FROM DISK

TOTAL POINTS ______________________ ¦ LETTER GRADE ______________________

UNIT 8 - OBJECTIVE 3

WORD PROCESSING EVALUATION

GRADE SCALE FOR WORD PROCESSING EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

WORD PROCESSING EVALUATION

NAME ______________________________ COURSE ______________________________

INSTITUTION ______________________________ DATE ____________________

PROBLEM TITLE __________________________ BOOK __________________ PAGE ___

A. CREATE A NEW DOCUMENT______________________________
B. SET TABS______________________________
C. SET MARGINS______________________________
D. KEY IN TEXT______________________________
E. INSERT CHARACTERS ON A LINE______________________________
F. INSERT BLANK LINE(S)______________________________
G. DELETE CHARACTERS ON A LINE______________________________
H. DELETE LINE(S)______________________________
I. CENTER______________________________
J. UNDERLINE______________________________
K. HIGHLIGHT______________________________
L. COPY A BLOCK______________________________
M. MOVE A BLOCK______________________________
N. DELETE A BLOCK______________________________
O. REUSE A BLOCK______________________________
P. FIND AND REPLACE______________________________
Q. SPELL CHECK DOCUMENT______________________________
R. PRINT ENTIRE DOCUMENT______________________________
S. PRINT SELECTED TEXT______________________________
T. SAVE DOCUMENT______________________________
U. RETRIEVE DOCUMENT______________________________

TOTAL POINTS ______________________________ | LETTER GRADE ______________________________

UNIT 8 - OBJECTIVE 4

INTEGRATED APPLICATION EVALUATION

GRADE SCALE FOR INTEGRATED APPLICATION EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

INTEGRATED APPLICATION EVALUATION

NAME ______________________________ COURSE ________________________________

INSTITUTION ________________________________ DATE ______________________

PROBLEM TITLE ___________________________ BOOK __________________ PAGE ___

PROBLEM STATEMENT: Write letters to individual PTA members thanking them for their contribution (the amount and date given will be in the body of the letter). Names, addresses, date, amount will come from the data base.

ITEM	SCORE	
Data base prepared with correct fields		
Appropriate letter written		
Correctly keyed fields in letter		
Individual letters prepared		
TOTAL POINTS		
NUMBER/LETTER GRADE		

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology I

Unit No.: 9 Unit Title: Occupations and Personal Improvement

Core Objectives: Upon completion of this course, the student will:

*1. identify jobs that use computers.
*2. describe how computers are used in various occupations.
*3. list several computer related career opportunities, their job responsibility, general education required, and/or salary ranges.
*4. identify Future Business Leaders of America--Phi Beta Lambda, its acronym, its leadership and competition opportunities, and its opportunities for attending conferences.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional source: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.

Levi Reiss. Computer Literacy. PWS Publishers. 1984.

Grace Murray Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co. 1984.

Donald H. Sanders. Computers Today. 2nd ed. New York, NY: McGraw-Hill Book Co. 1985.

James F. Clark and Judith J. Lambrecht. Information Processing. Anaheim Publishing Company. 1985.

Gary B. Shelly and Thomas J. Cashman. Introduction to Computers and Data Processing. Anaheim Publishing Company. 1980.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Identify 3 jobs that use computers with at least 69% accuracy.

*Objective 2. Describe how computers are used in 3 occupations with at least 69% accuracy.

*Objective 3. List 4 computer related career opportunities, their job responsibility, general education required, and/or salary ranges with at least 69% accuracy..

*Objective 4. Identify Future Business Leaders of America--Phi Beta Lambda, its acronym, its leadership and competition opportunities, and its opportunities for attending conferences according to teacher specifications with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Identified jobs that use computers.
_____ *2. Described how computers are used in various occupations.
_____ *3. Listed several computer related career opportunities, their job responsibility, general education required, and/or salary ranges.
_____ *4. Identified Future Business Leaders of America--Phi Beta Lambda, its acronym, its leadership and competition opportunities, and its opportunities for attending conferences.

*Indicates core/essential objectives

COMPUTER PROGRAMMING TECHNOLOGY II

COURSE GUIDE

Developed by

Joe Jolly, McComb Vocational Center
Joan Prahal, DeSoto County Vocational Center

Team Leader

Jean T. Henson, Research and Curriculum Unit

COURSE OUTLINE

COMPUTER PROGRAMMING TECHNOLOGY II

Unit No.	Title
1	Introduction and Advanced Uses
2	Hardware Update and Review
3	Support Software Review
4	Internal Computer Hardware Design (Review and Extend Study)
5	Computer Operations
6	Advanced BASIC Language Syntax and Programming Applications
7	COBOL Language Syntax and Programming Applications
8	Purchase Software Applications
9	Computer Careers, Your Future, and Personal Improvement

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 1 Unit Title: Introduction and Advanced Uses

Core Objectives: Upon completion of this unit, the student will:

1. identify a recent use of the computer, prepare a report on it using a word processor, and present an oral report to the class.
2. identify machines, concepts, places, dates, and/or persons associated with the history of computers.

*3. identify terms contained within the scope of data processing.

*4. identify the data processing cycle in a business organization and/or related terms.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional sources: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

Levi Reiss. Computer Literacy. PWS Publishers. 1984.

Grace Murray Hopper and Steven L. Mandell, Understanding Computers. West Publishing Co., 1984.

Donald H. Sanders. Computers Today Second Edition. New York, NY: McGraw-Hill Book Company. 1985.

James F. Clark and Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.

Gary B. Shelly, Thomas J. Cashman. Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.

Evaluation and Suggested Minimum Performance Standards:

Objective 1. Identify a recent use of the computer, prepare a report on it using a word processor, and present an oral report to the class with at least 69% accuracy.

Objective 2. Identify machines, concepts, places, dates, and/or persons associated with the history of computers with at least 69% accuracy. (finger counting, abacus, soraban, Napier's bones, slide rule, Blaise Pascal, Gotefried von Leibnitz, Joseph Jacquard, Charles Babbage, Charles Xavier Thomas, Boolean Algebra, Frank S. Baldwin, Dorr Eugene Felt and William S. Burroughs, IBM, Herman Hollerith, James Powers, Mark I, ENIAC, EDSAC, John von Neumann, UNIVAC, 1956, 1959, transistors, photolithography, Dr. Ted Hoff, integrated circuit, silicon chip, Silicon Valley, microprocessor)

*Objective 3. Identify terms contained within the scope of data processing with at least 69% accuracy. (calculating, coding [classifying], communicating, recording, retrieving, sorting, storing, summarizing, data processing, data, information, computer, input, input medium, original data, output, output medium, raw data, source document, information processing)

*Objective 4. Identify the data processing cycle in a business organization by pictorially illustrating the data processing cycle and/or identifying the vocabulary terms with at least 69% accuracy. (origination, input, processing, output, storage, batch processing, business data processing, feedback, merge, profit and loss statement, purchase order, source document, sales invoice, payment check, unit-record system)

*Indicates core/essential objectives

Performance Record:

_____ 1. Identified a recent use of the computer, prepared a report on it using a word processor, and presented an oral report to the class.

_____ 2. Identified machines, concepts, places, dates, and/or persons associated with the history of computers.

_____ *3. Identified terms contained within the scope of data processing.

_____ *4. Identified the data processing cycle in a business organization.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 2 Unit Title: Hardware Update and Review

Core Objectives: Upon completion of this unit, the student will:

*1. identify terms related to hardware.
*2. demonstrate proper care of the equipment and/or identify things that are harmful to the computer, related hardware and/or media.
*3. identify hardware for control, internal storage, and computation; hardware for input of data; hardware for output of information; and hardware for mass data storage.
*4. graphically illustrate the relationship between the four functions performed and/or between the four types of hardware typically found in a computer center.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional sources: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

Levi Reiss. Computer Literacy. PWS Publishers. 1984.

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Donald H. Sanders. Computers Today Second Edition. New York, NY: McGraw-Hill Book Company. 1985.

James F. Clark and Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.

Gary B. Shelly, Thomas J. Cashman. Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Identify terms related to hardware with at least 69% accuracy. (millisecond, nanosecond, works with numbers or letters, 2 types of computers, characteristics of digital computers, hardware, data, information, information processing, system, information system, output, input, processing, raw data, computer, source document, microcomputer, supercomputer, minicomputer, 4 generations of computers [their characteristics, dates of each generation, and/or an example of each generation], MIS)

*Objective 2. Demonstrate proper care of the equipment and identify things that are harmful to the computer, related hardware and/or media based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 3. Identify hardware for control, internal storage, and computation; hardware for input of data; hardware for output of information; and hardware for mass data storage with at least 69% accuracy.

*Objective 4. Graphically illustrate the relationship between the four functions performed and/or between the four types of hardware typically found in a computer center with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Identified terms related to hardware.

_____ *2. Demonstrated proper care of the equipment and/or identified things that are harmful to the computer and related hardware and/or media.

_____ *3. Identified hardware for control, internal storage, and computation; hardware for input of data; hardware for output of information; and hardware for mass data storage

_____ *4. Graphically illustrated the relationship between the four functions performed and/or between the four types of hardware typically found in a computer center.

*Indicates core/essential objectives

UNIT 2 - OBJECTIVE 2

HARDWARE AND/OR MEDIA CARE EVALUATION

GRADE SCALE FOR HARDWARE AND/OR MEDIA CARE EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

HARDWARE AND/OR MEDIA CARE EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ____________________ BOOK ________________ PAGE ___

ITEM	SCORE			
No horseplay around hardware				
No food or drink brought around hardware				
Operates hardware gently and smoothly				
Operates hardware only after operation instructions have been given				
Calls teacher attention when malfunction of hardware arises to get assistance				
Exhibits proper operation/cleaning techniques of hardware				
Powers off hardware when finished using				
Uses manuals when ?s arise & puts them back where belong				
Handles diskettes correctly and returns them to their protective envelope when not in use				
TOTAL POINTS/OBSERVATION				
NUMBER/LETTER GRADE/OBSERVATION, FINAL NUMBER/LETTER GR.				
FINAL NUMBER/LETTER GRADE				

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 3 Unit Title: Support Software Review

Core Objectives: Upon completion of this unit, the student will:

1. describe the 80-column punched card and/or related terms.
*2. identify terms pertaining to support software.
*3. name the four characteristics of a program.
*4. identify the steps involved in program preparation.
*5. identify the names and/or types and/or example instructions of four programming languages.
*6. identify the shape and function of flowchart symbols and/or identify steps in writing pseudocode.
*7. recognize and/or demonstrate X-3 Committee Standards of the ANSI for constructing flowcharts and/or recognize and/or demonstrate pseudocode writing skills.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional sources: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.
S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.
Levi Reiss. Computer Literacy. PWS Publishers. 1984.
Grace Murray Hopper and Steven L. Mandell, Understanding Computers. West Publishing Co., 1984.
Donald H. Sanders. Computers Today Second Edition. New York, NY: McGraw-Hill Book Company. 1985.
James F. Clark and Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.
Gary B. Shelly, Thomas J. Cashman. Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.
Standard Honeywell Template Manual. Honeywell,

Inc.
Flowchart Template. Honeywell, Inc.

Evaluation and Suggested Minimum Performance Standards:

Objective 1. Describe the 80-column punched card and/or related terms with at least 69% accuracy. (punched card, key-driven card punch, Herman Hollerith, IBM, card field, card verifier, binary code, card column, digit, 11 position, 9 edge, card row, 12 edge, 12 position, X position, Y position, zone punch, numeric punch, number punches in a column to represent any one digit number, number punches in a column to represent any letter of the alphabet)

*Objective 2. Identify terms pertaining to support software with at least 69% accuracy. (program [noun], programmer, software, program [verb], input [noun], input [verb], Output [noun], output [verb], flowchart, algorithm or algorism, characteristics of an algorithm, machine language, Grace Hopper, compiler language (also list its 3 parts), subroutine, source program, object program, syntax, pseudocode, coding, hierarchy chart, module, structured programming, top-down design, menu, problem, debugging, documentation, copyright, canned software, systems software, operating system, utility program, boot up, catalog, directory, applications software, report spacing chart, custom-written software, machine language, assembly language, assembler, high-level language, interpreter program, compiler program)

*Objective 3. Name the four characteristics of a program with at least 69% accuracy.

*Objective 4. Identify the 8 steps involved in program preparation with at least 69% accuracy.

*Objective 5. Identify the names and/or types and/or example instructions of four programming languages with at least 69% accuracy..

*Objective 6. Identify the shape and function of 17 flowchart symbols and/or identify steps in writing pseudocode with at least 69% accuracy.

*Objective 7. Recognize and/or demonstrate X-3 Committee Standards of the ANSI for constructing flowcharts and/or recognize and/or demonstrate pseudocode writing skills by drawing a flowchart and/or writing the pseudocode for a given application with at least 69% accuracy.

*indicates core/essential objectives

Performance Record:

_____ 1. Described the 80-column punched card and/or related terms
_____ *2. Identified terms pertaining to support software.
_____ *3. Named the four characteristics of a program.
_____ *4. Identified the 8 steps involved in program preparation.

_____ *5. Identified the names and/or types and/or example instructions of four programming languages.

_____ *6. Identified the shape and function of 17 flowchart symbols and/or identified steps in writing pseudocode.

_____ *7. Recognized and/or demonstrated X-3 Committee Standards of the ANSI for constructing flowcharts and/or recognized and/or demonstrated pseudocode writing skills.

*Indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 4 Unit Title: Internal Computer Hardware Design (Review and Extend Study)

Core Objectives: Upon completion of this unit, the student will:

*1. recognize concepts and/or perform operations of Boolean Algebra for applications including propositions and circuits.
*2. demonstrate pictorially how data is represented within the computer using binary representation.
*3. demonstrate pictorially how data is stored using the Extended Binary Coded Decimal Interchange Code (EDCDIC) and ASCII Code.
*4. identify types of primary storage.
*5. compare EBCDIC and ASCII representations of characters.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional sources: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.
S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.
Levi Reiss. Computer Literacy. PWS Publishers. 1984.
Grace Murray Hopper and Steven L. Mandell, Understanding Computers. West Publishing Co., 1984.
Donald H. Sanders. Computers Today Second Edition. New York, NY: McGraw-Hill Book Company. 1985.
James F. Clark and Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.
Gary B. Shelly, Thomas J. Cashman. Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Recognize concepts and/or perform operations of Boolean Algebra for 3 applications including propositions and circuits with at least 69% accuracy. (and, or, serial circuit, parallel circuit, true and true = ?, true and false = ?, true or true = ?, true or false = ?, 2 closed switches in a serial circuit yields ?, one closed and one open switch in a serial circuit yields ?, 2 closed switches in a parallel circuit yields ?, one closed and one open switch in a parallel circuit yields ?)

*Objective 2. Demonstrate pictorially how data is represented within the computer using binary representation with at least 69% accuracy.

*Objective 3. Demonstrate pictorially how data is stored using the Extended Binary Coded Decimal Interchange Code (EDCDIC) and ASCII Code with at least 69% accuracy.

*Objective 4. Identify 3 types of primary storage with at least 69% accuracy.

*Objective 5. Compare EBCDIC and ASCII representations of 3 characters with at least 69% accuracy.

*indicates core/essential objectives

Performance Record:

_____ *1. Recognized various concepts and/or performed various operations of Boolean Algebra to several applications including propositions and circuits.

_____ *2. Demonstrated pictorially how data is represented within the computer using binary representation.

_____ *3. Demonstrated pictorially how data is stored using the Extended Binary Coded Decimal Interchange Code (EDCDIC) and ASCII Code.

_____ *4. Identified 3 types of primary storage.

_____ *5. Compared EBCDIC and ASCII representations of 3 characters.

*indicates core/essential objectives

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 5 Unit Title: Computer Operations

Core Objectives: Upon completion of this unit, the student will:

*1. Recognize and utilize the computer system to be used--its hardware configuration and characteristics.
*2. Illustrate for disk drives: power on, load diskette, unload diskette, and opening/closing disk drive door correctly.
*3. Illustrate for character printer: power on, load paper, line feed, form feed, and operations.
*4. Differentiate between internal memory and auxiliary storage.
*5. Operate computer and run programs.
*6. Recognize facts/handling techniques pertaining to diskettes.
*7. Perform operations on diskettes such as formatting, copying diskettes, comparing diskettes, copying a file, comparing a file, and displaying a directory.
*8. Identify online-realtime computer systems.
*9. Illustrate how a mainframe/minicomputer with emulating PCs represents an online-realtime system.
*10. Recognize that the mainframe/minicomputer uses a hard fixed disk for mass data storage and also that it uses diskettes for auxiliary storage and has internal memory.
*11. Recognize how to run programs from mainframe/minicomputer via emulating PCs and display work stations.
*12. Differentiate between sequential and random access files.
*13. Plan magnetic tape records.
*14. Plan magnetic disk records.
*15. Identify sequencing.
*16. Identify selecting.
*17. Identify merging.
*18. Identify matching.
*19. Identify match-merging.
*20. Identify sequence-checking.
*21. Identify utility programs and identify some of the routine jobs performed by them.
*22. Identify application program, who wrote it, and for what type jobs.
*23. Identify systems software and/or identify some of its functions.
*24. Identify operating system, list several together with their developer(s) and/or one of their characteristics.
*25. Demonstrate proper care and user responsibility in operating computer hardware.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and and for software used.

Additional sources: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.

Levi Reiss, Computer Literacy. PWS Publishers. 1984.

Grace Murray Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co. 1984.

Donald H. Sanders. Computers Today. 2nd ed. New York, NY: McGraw-Hill Book Company. 1985

James F. Clark and Judith J. Lambrecht. Information Processing, Cincinnati, Ohio: South-Western Publishing Co. 1985.

Gary B. Shelly, Thomas J. Cashman, Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Recognize and utilize the computer system to be used--its hardware configuration and characteristics by running at least twice the computer manufacturer tutorial for the computer system to be used and/or based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 2. Illustrate for disk drives: power on, load diskette, unload diskette, and opening/closing disk drive doors correctly based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 3. Illustrate for character printer: power on, load paper, line feed, form feed, and operations based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 4. Differentiate between internal memory and auxiliary storage by defining each with at least 69% accuracy.

*Objective 5. Operate computer and run programs by loading and running 3 programs (tutorial and/or games) based on teacher rating scale (attached) with at least 69% accuracy.

*Objective 6. Recognize facts/handling techniques pertaining to diskettes based on teacher made test and/or checklist with at least 69% accuracy.

*Objective 7. Perform operations on diskettes such as formatting, copying diskettes, comparing diskettes, copying a file, comparing a file, and displaying a directory according to teacher checklist and/or rating scale with at least 70% accuracy.

*Objective 8. Identify online-realtime computer systems with at least 69% accuracy.

*Objective 9. Illustrate how a mainframe/mini computer with emulating PCs represents an online-realtime system by drawing and verbal/written comments with at least 69% accuracy.

*Objective 10. Recognize that the mainframe/mini computer uses a hard fixed disk for mass data storage and also that it uses diskettes for auxiliary storage and has internal memory based on teacher made test with at least 69% accuracy.

*Objective 11. Recognize how to run programs from mainframe/mini computer via emulating PCs and display work stations by adding more details to drawing and comments to EVALUATION OF OBJECTIVE 9 (as necessary) with at least 69% accuracy.

*Objective 12. Differentiate between sequential and random access files with at least 69% accuracy.

*Objective 13. Plan magnetic tape records given an advanced application with at least 69% accuracy.

*Objective 14. Plan magnetic disk records given an advanced application with at least 69% accuracy.

*Objective 15. Identify sequencing by selecting 3 examples of it with at least 69% accuracy.

*Objective 16. Identify selecting by choosing 3 examples of it with at least 69% accuracy.

*Objective 17. Identify merging by selecting 3 examples of it with at least 69% accuracy.

*Objective 18. Identify matching by selecting 3 examples of it with at least 69% accuracy.

*Objective 19. Identify match-merging by selecting 3 examples of it with at least 69% accuracy.

*Objective 20. Identify sequence-checking by selecting 3 examples of it with at least 69% accuracy.

*Objective 21. Identify utility programs and identify 3 of the routine jobs performed by them with at least 69% accuracy.

*Objective 22. Identify application program, who writes it, and for what type jobs with at least 69% accuracy.

*Objective 23. Identify systems software and/or identify 3 of its functions with at least 69% accuracy.

*Objective 24. Identify operating system, list 3 together with their developer(s) and/or one of their characteristics with at least 69% accuracy.

*Objective 25. Demonstrate proper care and user responsibility in operating computer hardware according to teacher checklist with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Recognized and utilized the computer system to be used--its hardware configuration and characteristics.
_____ *2. Illustrated for disk drives: power on, load diskette, unload diskette, and opening/closing disk drive doors correctly.
_____ *3. Illustrated for character printers: power on, load paper, line feed, form feed, and operations.
_____ *4. Differentiated between internal memory and auxiliary storage.
_____ *5. Operated computer and ran programs.
_____ *6. Recognized facts/handling techniques pertaining to diskettes.
_____ *7. Performed operations on diskettes such as formatting, copying diskettes, comparing diskettes, copying a file, comparing a file, and displaying a directory.
_____ *8. Identified online-realtime computer systems.
_____ *9. Illustrated how a mainframe/mini computer with emulating PCs represents an online-realtime system.
_____*10. Recognized that the mainframe/mini computer uses a hard fixed disk for mass data storage and also that it uses diskettes for auxiliary storage and has internal memory.
_____*11. Recognized how to run programs from mainframe/mini computer via emulating PCs and display work stations.
_____*12. Differentiated between sequential and random access files.
_____*13. Planned magnetic tape records.
_____*14. Planned magnetic disk records.
_____*15. Identified sequencing.
_____*16. Identified selecting.
_____*17. Identified merging.
_____*18. Identified matching.
_____*19. Identified match-merging.
_____*20. Identified sequence-checking.
_____*21. Identified utility programs and identified 3 of the routine jobs performed by them.
_____*22. Identified application program, who wrote it, and for what type jobs.
_____*23. Identified systems software and/or identify 3 of its functions.
_____*24. Identified operating system, listed 3 together with their developer(s) and/or one of their characteristics.
_____*25. Demonstrated proper care and user responsibility in operating computer hardware.

*Indicates core/essential objectives

UNIT 5 - OBJECTIVE 1

COMPUTER SYSTEM EVALUATION

GRADE SCALE FOR COMPUTER SYSTEM EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

COMPUTER SYSTEM EVALUATION

NAME ______________________________ COURSE ______________________________

INSTITUTION ______________________________ DATE ____________________

PROBLEM TITLE ______________________ BOOK ________________ PAGE ___

POINTED OUT	SCORE
Color Monitor	
Monochrome Monitor	
Diskdrive A	
Diskdrive B	
On/off switch for color monitor	
Off position for switch on system	
On position for switch on system	
Correct settings for switches to control brightness, etc. on monitors	
Printers with on/off switch settings	
TOTAL POINTS	
NUMBER/LETTER GRADE	

UNIT 5 - OBJECTIVE 2

DISK DRIVE EVALUATION

GRADE SCALE FOR DISK DRIVE EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

DISK DRIVE EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION __________________________ DATE ________________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

OPERATION	SCORE
Power on	
Load diskette into drive	
Close diskette drive door	
Open diskette drive door	
Unload diskette from drive	
Power off	
Load a program and run it	
Save a file on the diskette	
TOTAL POINTS	
NUMBER/LETTER GRADE	

UNIT 5 - OBJECTIVE 3

CHARACTER PRINTER EVALUATION

GRADE SCALE FOR CHARACTER PRINTER EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

CHARACTER PRINTER EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

OPERATION	SCORE
Power on	
Load paper	
Set paper at head of form	
Online switch on	
Online switch off	
Line feed	
Form feed	
Print from computer	
Tear printed copy off	
TOTAL POINTS	
NUMBER/LETTER GRADE	

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UNIT 5 - OBJECTIVE 5

COMPUTER OPERATIONS EVALUATION

GRADE SCALE FOR COMPUTER OPERATIONS EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

COMPUTER OPERATIONS EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ____________________ BOOK ________________ PAGE ___

OPERATION	SCORE				
Load DOS or IPLable					
Load program diskette					
Power on					
Display directory					
Load program					
Run program					
Correctly terminate program					
Unload program diskette					
Power off					
TOTAL POINTS/PROGRAM					
TOTAL POINTS ALL PROGRAMS					
NUMBER/LETTER GRADE					

UNIT 5 - OBJECTIVE 6

DISKETTE FACT/HANDLING TECHNIQUE EVALUATION

GRADE SCALE FOR DISKETTE FACT/HANDLING TECHNIQUE EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

DISKETTE FACT/HANDLING TECHNIQUE EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

FACT/HANDLING TECHNIQUE	SCORE			
Held only where label is located				
Diskette surface is never touched				
Loaded into drive only when red light is off				
Unloaded from drive only when red light is off				
Diskette is inserted into drive gently				
Diskette is always returned to its protective envelope when not in use				
Diskette is protected from dust, dirt, heat, cold, water, direct sunlight, smoke, and magnetic materials				
Diskette is never bent or folded				
Label on diskette is written on only with felt tip pen				
Paper clips or rubber bands are never put around disks				
Erasers are never used on diskettes				
TOTAL POINTS/OBSERVATION				
NUMBER/LETTER GRADE/OBSERVATION, FINAL NUMBER/LETTER GR.				
FINAL NUMBER/LETTER GRADE				

UNIT 5 - OBJECTIVE 7

OPERATIONS ON DISKETTES

GRADE SCALE FOR OPERATIONS ON DISKETTES EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

OPERATIONS ON DISKETTES EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

OPERATION	SCORE
FORMAT DISKETTE	
COPYING A DISKETTE	
COMPARING DISKETTES	
COPYING A FILE	
COMPARING FILES	
DISPLAY A DIRECTORY	
TOTAL POINTS	
LETTER GRADE	

UNIT 5 - OBJECTIVE 25

OPERATIONS CARE/USER RESPONSIBILITY EVALUATION
GRADE SCALE FOR OPERATIONS CARE/USER RESPONSIBILITY EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

OPERATIONS CARE/USER RESPONSIBILITY EVALUATION

NAME ______________________ COURSE ________________________

INSTITUTION _________________________ DATE ________________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

ITEM	SCORE			
No horseplay around hardware				
No food or drink brought around hardware				
Operates hardware gently and smoothly				
Operates hardware only after operation instructions have been given				
Calls teacher attention when malfunction of hardware arises to get assistance				
Exhibits proper operation/cleaning techniques of hardware				
Powers off hardware when finished using				
Uses manuals when question arises				
Returns manuals to proper place when finished using				
TOTAL POINTS/OBSERVATION				
NUMBER/LETTER GRADE/OBSERVATION, FINAL NUMBER/LETTER GR.				
FINAL NUMBER/LETTER GRADE				

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 6 Unit Title: Advanced BASIC Language Syntax and Programming Applications

Core Objectives: Upon completion of this unit, the student will:

*1. DCUOTBL syntax for two-dimension arrays.
*2. DFWRD a program utilizing two-dimension arrays.
*3. DCUOTBL syntax for color and/or graphics.
*4. DFWRD a program utilizing color and/or graphics.
*5. DCUOTBL syntax for creating, writing, accessing, updating, and reading disk data files both sequential and random.
*6. DFWRD programs for creating, writing, accessing, updating, and reading disk data files both sequential and random.
*7. DFWRD a program (project) utilizing advanced BASIC techniques.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional sources: Flowchart Template. Honeywell, Inc.
Standard Honeywell Template Manual; Honeywell, Inc.
Donald T. Payne, William R. Beck. IBM BASIC. Prentice-Hall, Inc. 1983.
Gary B. Shelly and Thomas J. Cashman. Introduction to BASIC Programming. Anaheim Publishing Company. 1982.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. DCUOTBL syntax for two-dimension arrays including DIM for two dimension arrays and other statements already studied and written to function with two-dimension arrays based upon the computer hardware and software being utilized with at least 69% accuracy.
*Objective 2. DFWRD a program utilizing two-dimension arrays according to teacher rating scale (attached) with at least 69% accuracy.
*Objective 3. DCUOTBL syntax for color and/or graphics including CLS, COLOR, LOCATE, PRINT, SCREEN, WIDTH, WRITE, CSRLIN, POS, SPC, TAB, CIRCLE, DRAW, GET, LINE, PAINT, PRESET, PSET, PUT, VIEW, WINDOW, PMAP, and POINT based upon the computer hardware and software being utilized

with at least 69% accuracy.

*Objective 4. DFWRD a program utilizing color and/or graphics according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 5. DCUOTBL syntax for creating, writing, accessing, updating, and reading disk data files both sequential and random including CLOSE, EOF, INPUT #, INPUT$, LINE INPUT #, LOC, LOF, OPEN, PRINT # USING, WRITE #, FIELD, GET, LSET/RSET, and PUT based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 6. DFWRD programs for creating, writing, accessing, updating, and reading disk data files both sequential and random according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 7. DFWRD a program (project) utilizing advanced BASIC techniques according to teacher rating scale (attached) with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. DCUOTBL syntax for two-dimension arrays.

_____ *2. DFWRD a program utilizing two-dimension arrays.

_____ *3. DCUOTBL syntax for color and/or graphics.

_____ *4. DFWRD a program utilizing color and/or graphics.

_____ *5. DCUOTBL syntax for creating, writing, accessing, updating, and reading disk data files both sequential and random.

_____ *6. DFWRD programs for creating, writing, accessing, updating, and reading disk data files both sequential and random.

_____ *7. DFWRD a program (project) utilizing advanced BASIC techniques.

*Indicates core/essential objectives

UNIT 6 - OBJECTIVES 2, 4, 6, 8, 9
GRADE SCALE FOR PROGRAM EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3- NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

NAME ______________________________ COURSE ______________________________
INSTITUTION ______________________________ DATE ____________________

PROGRAM TITLE ____________________ BOOK ____________________ PAGE ____

A. TASKS

B. FLOWCHART

(A) NEATNESS

(B) FLOW OK

(C) CORRECT SYMBOLS

(D) PROPER ALGORITHM TRANSLATION

(E) REPRESENTS GOOD PROGRAMMING TECHNIQUES

(F) WORDS IN SYMBOLS OK

C. PROGRAM

(A) DOCUMENTATION

(B) READABLE

(C) REPRESENTS GOOD PROGRAMMING

(D) ENHANCEMENTS

D. OUTPUT

(A) GOOD FORM

(B) ACCURATE

(C) LIKE PICTURE REQUIREMENT

E. PRESENTATION OF A - D

F. Time required for completion

TOTAL POINTS ____________________ | LETTER GRADE ____________________

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 7 Unit Title: COBOL Language Syntax and Programming Applications

Core Objectives: Upon completion of this unit, the student will:

*1. identify the components of the IBM System/34 Computer System Hardware configuration to be used and/or their various characteristics.
*2. identify the four divisions of a COBOL program and the characteristics of each.
*3. recognize the types of entries within each division.
*4. edit printed output using picture clauses and the knowledge of the data in storage.
*5. prepare the Data Division from a record layout (visually illustrated on punched card) and/or from a print line layout (visually illustrated on print layout form).
*6. name the basic classifications of COBOL verbs and an example of a verb under each classification.
*7. identify and/or illustrate the meanings of destructive read-in and nondestructive read-out.
*8. edit printed output using picture clauses and the knowledge of the data in storage.
*9. DCUOTBL syntax for input/output operations.
*10. DFWRD a program to perform input/output operations.
*11. DCUOTBL syntax for performing the 4 basic arithmetic operations.
*12. DFWRD programs to perform some or all of the 4 basic arithmetic operations.
*13. describe and/or identify answers pertaining to the rounding process.
*14. DCUOTBL syntax to perform arithmetic operations, round, edit with a dollar sign, comma, decimal point, per cent sign, and/or sort.
*15. DFWRD a program to perform arithmetic operations, round, edit with a dollar sign, comma, decimal point, per cent sign, and/or sort.
*16. DCUOTBL syntax for accumulating final total(s).
*17. DFWRD a program to prepare a report which will accumulate final total(s) of one or more items.
*18. DCUOTBL syntax for making comparisons.
*19. DFWRD a program in which comparisons are to be made.
*20. DCUOTBL syntax for utilizing condition names to determine the processing to be done.
*21. DFWRD a program in which condition names will determine the processing to be done.
*22. DCUOTBL syntax for printing headings.
*23. DFWRD a program to produce a report in which headings are to be printed.
*24. DCUOTBL syntax for accumulating and printing minor as well as final total(s).

*25. DFWRD a program to prepare a report in which minor total(s) as well as final total(s) will be accumulated and printed.
*26. DCUOTBL syntax for accumulating and printing minor, intermediate, and major total(s).
*27. DFWRD a program to prepare a report in which minor, intermediate, and major total(s) will be accumulated and printed.
*28. DCUOTBL syntax to perform a table lookup.
*29. DFWRD a program to perform a table lookup.

*indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional sources: Gary B. Shelly and Thomas J. Cashman. ANSI COBOL Introduction to Computer Programming. Anaheim Publishing Company. 1973.
Standard Honeywell Template Manual. Honeywell Inc.
Flowchart Template. Honeywell, Inc
Elias M. Awad. Automatic Data Processing Principles and Procedures. Prentice-Hall, Inc.
S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Identify the components of the Computer System Hardware configuration to be used and/or their characteristics based on teacher rating scale (attached) with at least 69% accuracy.
*Objective 2. Identify the four divisions of a COBOL program and the characteristics of each with at least 69% accuracy.
*Objective 3. Identify the types of entries within each division with at least 69% accuracy.
*Objective 4. Edit printed output using picture clauses and the knowledge of the data in storage with at least 69% accuracy.
*Objective 5. Prepare the Data Division from a record layout (visually illustrated on punched card) and/or from a print line layout (visually illustrated on print layout form) with at least 69% accuracy.
*Objective 6. Name the 6 basic classifications of COBOL verbs and an

example of a verb under each classification with at least 69% accuracy.

*Objective 7. Identify and/or illustrate the meanings of destructive read-in and nondestructive read-out with at least 69% accuracy.

*Objective 8. Edit printed output using picture clauses and the knowledge of the data in storage with at least 69% accuracy.

*Objective 9. DCUOTBL syntax for input/output operations including writing the identification and environment divisions and statements for OPEN, READ, MOVE, WRITE, GO TO, CLOSE, ACCEPT, NOTE and/or DISPLAY based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 10. DFWRD a program to perform input/output operations according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 11. DCUOTBL syntax for performing the 4 basic arithmetic operations including statements for ADD...GIVING, ADD ... TO, SUBTRACT ... FROM .., SUBTRACT ... FROM .. GIVING .., MULTIPLY ... BY ..., GIVING ..., DIVIDE ... INTO ..., DIVIDE ... INTO/BY ... GIVING ..., (THESE USED WITH OR WITHOUT THE "ROUNDED .. ON SIZE ERROR .." FEATURE based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 12. DFWRD programs to perform some or all of the 4 basic arithmetic operations according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 13. Describe and/or identify answers pertaining to the rounding process with at least 69% accuracy.

*Objective 14. DCUOTBL syntax to perform arithmetic operations, round, edit with a dollar sign, comma, decimal point, per cent sign, and/or sort based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 15. DFWRD a program to perform arithmetic operations, round, edit with a dollar sign, comma, decimal point, per cent sign, and/or sort according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 16. DCUOTBL syntax for accumulating final totals including the four basic operations and statements for COMPUTE ... = ..., VALUE IS ..., USUAGE IS ..., (THESE USED WITH OR WITHOUT THE ROUNDED ... ON SIZE ERROR ... FEATURE) based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 17. DFWRD a program to prepare a report which will accumulate final totals of one or more items according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 18. DCUOTBL syntax for making comparisons including IF ... ELSE based upon the computer hardware and software being utilized with at least 69% accuracy.

Objective 19. DFWRD a program in which comparisons are to be made according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 20. DCUOTBL syntax for utilizing condition names to determine the processing to be done including IF ... GO TO ... , LEVEL 88 ENTRIES, GO TO ... DEPENDING, REDEFINES CLAUSE, EXAMINE CLAUSE, based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 21. DFWRD a program in which condition names will determine the processing to be done according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 22. DCUOTBL syntax for printing headings including WRITE ... FROM ... BEFORE/AFTER ADVANCING ..., PERFORM ... (THRU) ..., ... EXIT, based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 23. DFWRD a program to produce a report in which headings are to be printed according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 24. DCUOTBL syntax for accumulating and printing minor as well as final total(s) based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 25. DFWRD a program to prepare a report in which minor total(s) as well as final total(s) will be accumulated and printed according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 26. DCUOTBL syntax for accumulating and printing minor, intermediate, and major total(s) based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 27. DFWRD a program to prepare a report in which minor, intermediate, and major total(s) will be accumulated and printed according to teacher rating scale (attached) with at least 69% accuracy.

*Objective 28. DCUOTBL syntax to perform a table lookup including SUBSCRIPTS, MOVE, and/or OCCURS CLAUSE based upon the computer hardware and software being utilized with at least 69% accuracy.

*Objective 29. DFWRD a program to perform a table lookup according to teacher rating scale on PROGRAM EVALUATION with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Identified the components of the Computer System Hardware configuration to be used and/or their characteristics.

_____ *2. Identified the four divisions of a COBOL program and the characteristics of each.

_____ *3. Identified the types of entries within each division.

_____ *4. Edited printed output using picture clauses and the knowledge of the data in storage.

_____ *5. Prepared the Data Division from a record layout (visually illustrated on punched card) and/or from a print line layout (visually illustrated on print layout form).

_____ *6. Named the 6 basic classifications of COBOL verbs and an example of a verb under each classification.

_____ *7. Identified and/or illustrated the meanings of destructive read-in and nondestructive read-out.

_____ *8. Edited printed output using picture clauses and the knowledge of the data in storage.

_____ *9. DCUOTBL syntax for input/output operations.

_____*10. DFWRD a program to perform input/output operations.

_____*11. DCUOTBL syntax for performing the 4 basic arithmetic operations.

_____*12. DFWRD programs to perform some or all of the 4 basic arithmetic operations.

_____*13. Described and/or identified answers pertaining to the rounding process.

_____*14. DCUOTBL syntax to perform arithmetic operations, round, edit with a dollar sign, comma, decimal point, per cent sign, and/or sort.

_____*15. DFWRD a program to perform arithmetic operations, round, edit with a dollar sign, comma, decimal point, per cent sign, and/or sort.

_____*16. DCUOTBL syntax for accumulating final total(s).

_____*17. DFWRD a program to prepare a report which will accumulate final total(s) of one or more items.

_____*18. DCUOTBL syntax for making comparisons.

_____*19. DFWRD a program in which comparisons are to be made.

_____*20. DCUOTBL syntax for utilizing condition names to determine the processing to be done.

_____*21. DFWRD a program in which condition names will determine the processing to be done.

_____*22. DCUOTBL syntax for printing headings.

_____*23. DFWRD a program to produce a report in which headings are to be printed.

_____*24. DCUOTBL syntax for accumulating and printing minor as well as final total(s).

_____*25. DFWRD a program to prepare a report in which minor total(s) as well as final total(s) will be accumulated and printed.

_____*26. DCUOTBL syntax for accumulating and printing minor, intermediate, and major total(s).

_____*27. DFWRD a program to prepare a report in which minor, intermediate, and major total(s) will be accumulated and printed.

_____*28. DCUOTBL syntax to perform a table lookup.

_____*29. DFWRD a program to perform a table lookup.

*indicates core/essential objectives

UNIT 7 - OBJECTIVE 1

COMPUTER SYSTEM EVALUATION
GRADE SCALE FOR COMPUTER SYSTEM EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

COMPUTER SYSTEM EVALUATION

NAME ______________________________ COURSE ________________________________

INSTITUTION ___________________________________ DATE ______________________

PROBLEM TITLE __________________________ BOOK ___________________ PAGE ___

POINTED OUT OR DID	SCORE
Color Monitor	
Monochrome Monitor	
Diskdrive A	
Diskdrive B	
On/off switch for color monitor	
Off position for switch on system	
On position for switch on system	
Correct settings for switches to control brightness, etc. on monitors	
Printers with on/off switch settings	
Sign-on system for COBOL	
Power-up system/Power-down system	
TOTAL POINTS	
NUMBER/LETTER GRADE	

UNIT 7 - OBJECTIVES 10, 12, 15, 17, 19, 21, 23, 25, 27, 29
GRADE SCALE FOR PROGRAM EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3- NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

NAME ______________________________ COURSE ________________________________
INSTITUTION ____________________________________ DATE ______________________

PROGRAM TITLE ___________________________ BOOK ___________________ PAGE ___

A. TASKS

B. FLOWCHART

(A) NEATNESS

(B) FLOW OK

(C) CORRECT SYMBOLS

(D) PROPER ALGORITHM TRANSLATION

(E) REPRESENTS GOOD PROGRAMMING TECHNIQUES

(F) WORDS IN SYMBOLS OK

C. PROGRAM

(A) DOCUMENTATION

(B) READABLE

(C) REPRESENTS GOOD PROGRAMMING

(D) ENHANCEMENTS

D. OUTPUT

(A) GOOD FORM

(B) ACCURATE

(C) LIKE PICTURE REQUIREMENT

E. PRESENTATION OF A - D

F. Time required for completion

TOTAL POINTS ________________________ | LETTER GRADE ________________________

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 8 Unit Title: Purchased Software Applications

Core Objectives: Upon completion of this unit, the student will:

*1. illustrate simple usage of word processing.
*2. illustrate simple usage of data base.
*3. illustrate simple usage of a spreadsheet.
*4. illustrate simple usage of an integrated application of word processing and data base with or without graphs.
*5. illustrate simple usage of DOS.
*6. illustrate simple usage of Lotus 123 and/or with simple programmed macros.
*7. illustrate simple usage of dBase III Plus and/or with simple programming.
*8. demonstrate simple usage of electronic communications by transmitting and receiving specified information.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional sources: S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.

S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.

Levi Reiss. Computer Literacy. PWS Publishers. 1984

Grace Murray Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co. 1984.

Donald H. Sanders. Computers Today. 2nd ed. New York, NY: McGraw Hill Book Co. 1985.

James F. Clark and Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.

Gary B. Shelly and Thomas J. Cashman. Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.

Tim Duffy. Four Software Tools. Wadsworth
Publishing Company. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Illustrate simple usage of Word Processing according to teacher rating scale (attached) based on application performance with at least 69% accuracy.

*Objective 2. Illustrate simple usage of data base according to teacher rating scale (attached) based on application performance with at least 69% accuracy.

*Objective 3. Illustrate simple usage of a spreadsheet according to teacher rating scale (attached) based on application performance with at least 69% accuracy.

*Objective 4. Illustrate simple usage of an integrated application of word processing and data base with or without graphs according to teacher rating scale (attached) based on application performance with at least 69% accuracy.

*Objective 5. Illustrate simple usage of DOS according to teacher rating scale (attached) based on application performance with at least 69% accuracy.

*Objective 6. Illustrate simple usage of Lotus 1-2-3 and/or with simple programmed macros according to teacher rating scale (attached) based on application performance with at least 69% accuracy.

*Objective 7. Illustrate simple usage of dBase III Plus and/or with simple programming according to teacher rating scale (attached) based on application performance with at least 69% accuracy.

*Objective 8. Demonstrate simple usage of electronic communications by transmitting and receiving specified information using a communications simulation program with at least 69% accuracy.

*Indicates core/essential objectives

Performance Record:

_____ *1. Illustrated simple usage of word processing.
_____ *2. Illustrated simple usage of data base.
_____ *3. Illustrated simple usage of a spreadsheet.
_____ *4. Illustrated simple usage of an integrated application of word processing and data base with or without graphs.
_____ *5. Illustrated simple usage of DOS.
_____ *6. Illustrated simple usage of Lotus 123 and/or with simple programmed macros.
_____ *7. Illustrated simple usage of d Base III Plus and /or with simple programming.
_____ *8. Demonstrated simple usage of electronic communications by transmitting and receiving specified information.

*Indicates core/essential objectives

UNIT 8 - OBJECTIVE 1

WORD PROCESSING EVALUATION

GRADE SCALE FOR WORD PROCESSING EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

WORD PROCESSING EVALUATION

NAME ________________ COURSE ________________

INSTITUTION ________________ DATE ________________

PROBLEM TITLE ________________ BOOK ________________ PAGE ____

A. CREATE A NEW DOCUMENT ________________
B. SET TABS ________________
C. SET MARGINS ________________
D. KEY IN TEXT ________________
E. INSERT CHARACTERS ON A LINE ________________
F. INSERT BLANK LINE(S) ________________
G. DELETE CHARACTERS ON A LINE ________________
H. DELETE LINE(S) ________________
I. CENTER ________________
J. UNDERLINE ________________
K. HIGHLIGHT ________________
L. COPY A BLOCK ________________
M. MOVE A BLOCK ________________
N. DELETE A BLOCK ________________
O. REUSE A BLOCK ________________
P. FIND AND REPLACE ________________
Q. SPELL CHECK DOCUMENT ________________
R. PRINT ENTIRE DOCUMENT ________________
S. PRINT SELECTED TEXT ________________
T. SAVE DOCUMENT ________________
U. RETRIEVE DOCUMENT ________________
V. SPEED OF PRODUCTION ________________

TOTAL POINTS ________________ | LETTER GRADE ________________

UNIT 8 - OBJECTIVE 2

DATA BASE EVALUATION

GRADE SCALE FOR DATA BASE EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

DATA BASE EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

A. DESIGN A FILE

B. ADD FORMS TO THE FILE

C. EDIT SELECTED FORMS

D. DELETE SELECTED FORMS

E. SELECT CERTAIN FORM(S)

F. GENERATE REPORT(S)

G. PRINT LABELS

H. DETERMINE NO. FORMS
WITH GIVEN CHARACTERISTIC(S)

I. SELECTED FIELDS APPROPRIATELY

J. SPEED OF PRODUCTION

TOTAL POINTS ______________________ | LETTER GRADE ______________________

UNIT 8 - OBJECTIVE 3

SPREADSHEET EVALUATION

GRADE SCALE FOR SPREADSHEET EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

SPREADSHEET EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ____________________ BOOK ______________ PAGE ___

A. COLUMN HEADINGS

B. ROW HEADINGS

C. SET CELL STYLES

D. KEY VALUES IN CELLS

E. CREATE FORMULAS

F. RECALCULATE

G. PRINT

H. SAVE A FILE TO DISK

I. RETRIEVE A FILE FROM DISK

J. SPEED OF PRODUCTION

TOTAL POINTS ______________________ | LETTER GRADE ______________________

UNIT 8 - OBJECTIVE 4

INTEGRATED APPLICATION EVALUATION

GRADE SCALE FOR INTEGRATED APPLICATION EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

INTEGRATED APPLICATION EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ______________________ BOOK ______________ PAGE ___

PROBLEM STATEMENT: Write letters to contributors to the Heart Foundation thanking them for their contribution (the amount and date given will be in the body of the letter). Names, addresses, date, amount will come from the data base.

ITEM	SCORE	
Data base prepared with correct fields		
Appropriate letter written		
Correctly keyed fields in letter		
Individual letters prepared		
Speed of production		
TOTAL POINTS		
NUMBER/LETTER GRADE		

UNIT 8 - OBJECTIVE 5

DOS EVALUATION

GRADE SCALE FOR DOS EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

DOS EVALUATION

NAME ______________________ COURSE ______________________

INSTITUTION ______________________ DATE ______________________

PROBLEM TITLE ______________________ BOOK ______________ PAGE ____

FUNCTION	SCORE
A. SHOW DIRECTORY	
B. COPY ENTIRE DISKETTE	
C. COMPARE 2 ENTIRE DISKETTES	
D. COPY ONE FILE	
E. COMPARE 2 FILES	
F. FORMAT A DISKETTE	
G. USE BACKUP COMMAND FOR A DISKETTE TO ANOTHER	
H. CREATE A BATCH FILE	
I. EXECUTE A BATCH FILE	
J. CREATE AN AUTOEXEC.BAT FILE	
K. LOOK AT CONTENTS OF FILE WITH TYPE	

TOTAL POINTS		LETTER GRADE	

UNIT 8 - OBJECTIVE 6

LOTUS 123 EVALUATION

GRADE SCALE FOR LOTUS 123 EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

LOTUS 123 EVALUATION

NAME ______________________________ COURSE ________________________________

INSTITUTION ___________________________________ DATE ____________________

PROBLEM TITLE ___________________________ BOOK ___________________ PAGE ___

ITEM	SCORE
A. RUN LOTUS 123 TUTORIAL	
B. ENTER LABEL INTO A WORKSHEET CELL	
C. ENTER CONSTANT VALUE	
D. ENTER A FORMULA	
E. SET CELL STYLES	
F. KEY VALUES IN CELLS	
G. EDIT CONTENTS OF A WORKSHEET CELL	
H. CREATE FORMULAS	
I. RECALCULATE	
J. PRINT	
K. SAVE A FILE TO DISK	
L. BACKUP FILES ON DATA DISK	
M. RETRIEVE A FILE FROM DISK	
N. SPEED OF PRODUCTION	

TOTAL POINTS ____________________ LETTER GRADE ____________________

UNIT 8 - OBJECTIVE 7

D BASE III PLUS

GRADE SCALE FOR D BASE III PLUS EVALUATION

POINTS	EXPLANATION	LETTER
5	EXCELLENT IN EVERY ASPECT - A LITTLE EXTRA - NO ASSISTANCE	A
4	CORRECT - NO PROBLEM OR HESITATION- A LITTLE ASSISTANCE	B
3	MISTAKE(S) NO MORE THAN 3--NEEDS CORRECTING OR SOME HELP	C
2	MISTAKE(S) MORE THAN 3--NEEDS A LOT OF CORRECTING OR A - A LOT OF HELP	D
1	DID NOT DO OR SHOW OR GAVE LITTLE KNOWLEDGE OF ASPECT - NEEDS TO LEARN HOW TO DO	F

D BASE III PLUS EVALUATION

NAME ______________________________ COURSE ________________________________

INSTITUTION ___________________________________ DATE ______________________

PROBLEM TITLE ___________________________ BOOK ___________________ PAGE ___

ITEM	SCORE
A. DESIGN A FILE	
B. ADD FORMS TO THE FILE	
C. EDIT SELECTED FORMS	
D. DELETE SELECTED FORMS	
E. SELECT CERTAIN FORM(S)	
F. GENERATE REPORT(S)	
G. PRINT LABELS	
H. DETERMINE NO. FORMS WITH GIVEN CHARACTERISTIC(S)	
I. SELECTED FIELDS APPROPRIATELY	
J. SPEED OF PRODUCTION	
K. PROGRAM FOR SPECIFIC APPLICATION	
L. APPEND DATA INTO DOCUMENT	

TOTAL POINTS	LETTER GRADE

INSTRUCTIONAL MANAGEMENT PLAN

Course Title: Computer Programming Technology II

Unit No.: 9 Unit Title: Computer Careers, Your Future, and Personal Improvement

Core Objectives: Upon completion of this unit, the student will:

*1. Identify computer careers and/or careers in which usage of computers is essential together with job responsibilities, training required, expected salaries, future job opportunity outlook, and/or job location.
*2. Identify Future Business Leaders of America--Phi Beta Lambda, its acronym, its leadership and competition opportunities, and its opportunities for attending conferences.
*3. Identify components of and prepare a resume.

*Indicates core/essential objectives

Suggested Instructional Practices:

Lecture, discussion, and/or practical application

Suggested Resources:

Primary source: Manufacturer's manuals for computers in lab and for software used.

Additional sources:
S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1981.
S. J. Wanous, Gerald E. Wagner, and Judith J. Lambrecht. Fundamentals of Data Processing. Cincinnati, Ohio: South-Western Publishing Co. 1971.
Levi Reiss. Computer Literacy. PWS Publishers. 1984
Grace Murray Hopper and Steven L. Mandell. Understanding Computers. West Publishing Co. 1984.
Donald H. Sanders. Computers Today. 2nd ed. New York, NY: McGraw Hill Book Co. 1985.
James F. Clark and Judith J. Lambrecht. Information Processing. Cincinnati, Ohio: South-Western Publishing Co. 1985.
Gary B. Shelly and Thomas J. Cashman. Introduction To Computers and Data Processing. Anaheim Publishing Company. 1980.
Tim Duffy. Four Software Tools. Wadsworth Publishing Company. 1986.

Evaluation and Suggested Minimum Performance Standards:

*Objective 1. Identify computer careers and/or careers in which usage of computers is essential together with job responsibilities, training required, expected salaries, future job opportunity outlook, and/or job location with at least 69% accuracy.

*Objective 2. Identify Future Business Leaders of America--Phi Beta Lambda, its acronym, its leadership and competition opportunities, and its opportunities for attending conferences with at least 69% accuracy.

*Objective 3. Identify components of and prepare a resume with at least 69% accuracy and a mailable resume. Resume must meet the following criteria:

a. clear and concise presentation of facts with logical arrangement.
b. correct use of grammar and punctuation, correct spelling, and acceptable typewritten form

*Indicates core/essential objectives

Performance Record:

_____ *1. Identified computer careers and/or careers in which usage of computers is essential together with job responsibilities, training required, expected salaries, future job opportunity outlook, and/or job location.

_____ *2. Identified Future Business Leaders of America--Phi Beta Lambda, its acronym, its leadership and competition opportunities, and its opportunities for attending conferences.

_____ *3. Identified components of and prepared a resume.

Indicates core/essential objectives

INTENSIVE BUSINESS TRAINING

STUDENT PERFORMANCE RECORD

INTENSIVE BUSINESS TRAINING

Student: ______________________________

This record is provided as an alternative to the student performance records at the end of each unit. It can be duplicated for each student and serve as a cumulative record of competencies achieved in the course.

Place a check by each objective the student achieved; you may wish to note the date that the student achieved the objective, also.

C = Core competencies

_____C1. Identified objectives of Intensive Business Training.
_____C2. Described individual gains from Intensive Business Training.
_____C3. Identified considerations in career selection.
_____C4. Identified occupations in Intensive Business Training in the local community.
_____C5. Explained the leadership opportunities offered through membership in FBLA.
_____ 6. Explained the purpose of competitive activities and chapter awards.
_____C7. Increased typing speed 5-15 words per minute on 5-minute timed writings.
_____C8. Typed for 5 minutes with 5 or fewer errors.
_____C9. Identified correct safety procedures.
____C10. Identified terms associated with human relations.
____C11. Identified ways to establish and maintain positive employer-employee relationships.
____C12. Identified ways to encourage positive co-worker relationships.
____C13. Identified a basic guideline for serving customers.
____C14. Prepared a personal data sheet.
____C15. Prepared a letter of application.
____C16. Prepared a job application form.
____C17. Prepared a follow-up letter.
____C18. Prepared a letter of resignation
____C19. Identified possible sources of job placement.
____C20. Conducted him/herself appropriately on a personal interview for a job.
____C21. Made a copy of a document using a photocopy machine.
____C22. Identified terms associated with purchasing supplies.
____C23. Identified objectives of purchasing supplies.
____C24. Identified two methods of obtaining supplies.
____C25. Identified the procedures for ordering supplies.
____ 26. Identified supplies for general office use.
____C27. Prepared purchase orders, completed and extended totals, and computed cash and trade discounts.
____C28. Identified terms associated with work activities.
____C29. Identified the advantages of planning.
____ 30. Identified the disadvantages of working without a plan.

____C31. Identified the sequence of steps involved in planning and organizing work.

____ 32. Identified the various types of reminder devices that aid in planning and organizing work.

____C33. Identified terms associated with company policies and procedures.

____C34. Identified the purpose of policies and procedures.

____C35. Identified types of policies.

____C36. Identified types of procedures.

____ 37. Identified sources of information regarding policies and procedures.

____ 38. Identified travel terms.

____ 39. Identified information required to make reservations.

____ 40. Identified the information included on an itinerary.

____ 41. Selected material to be included in a travel folder.

____C42. Classified expenses by general category as shown on an expense report.

____ 43. Used a flight schedule to determine air fare, flight time, flight number, and flight cost.

____ 44. Determined mileage from a mileage chart.

____ 45. Used a rental car guide to determine cost of renting an automobile.

____ 46. Estimated travel expenses.

____ 47. Prepared a travel application.

____ 48. Prepared an itinerary.

____ 49. Prepared an expense report.

____C50. Identified terms associated with reference books.

____C51. Identified types of reference books available for use in an office.

____C53. Identified the types of resources available for use by an office worker.

____C54. Used a dictionary to write a definition.

____C55. Used a word book to hyphenate a word.

____C56. Used a reference manual to determine the purpose of an attention line.

____C57. Identified terms associated with information processing concepts.

____ 58. Identified structures associated with information processing and administrative support personnel.

____59. Identified job titles associated with information processing and administrative support personnel.

____60. Identified attitudes associated with information processing and administrative support personnel.

____C61. Identified skills associated with information processing and administrative support personnel.

____C62. Prepared and submitted a mailable document using word processing software.

____C63. Prepared letters using full block and modified block letter styles and prepared envelopes according to U.S. postal regulations.

____C64. Prepared a personnel requisition form, a travel application form, a purchase requisition, an invoice, and a payroll form.

____C65. Prepared memorandums, tables, minutes, and a formal business report.

____C66. Completed the following applications on the electronic calculator: add, subtract, multiply and divide, and computed percentages and discounts.

____C67. Completed a deposit slip, prepared checks, recorded information in a check register, and reconciled a bank statement.

____C68. Proved the petty cash book and replenished the petty cash fund.

____C69. Prepared a W-4 form, time card, payroll register and payroll check.

____C70. Completed a files management project on the microcomputer.

____C71. Designed and printed a data base report.

____C72. Designed and printed mailing labels.

____C73. Solved manual and automated general ledger problems.

____C74. Identified features of transcription equipment.

____C75. Identified terms associated with transcription equipment.

____C76. Identified transcription techniques.

____ 77. Identified skills required of a transcriptionist.

____C78. Produced mailable documents from recorded dictation.

____C79. Handled telephone inquiries.

____C80. Planed a call.

____C81. Recorded messages.

____C82. Used the telephone directory to find numbers for people, products, services, and businesses.

____C83. Identified terms, procedures, supplies, and equipment used in filing.

____C84. Indexed, coded, and alphabetized names, and cross referenced names.

____C85. Prepared index cards and filed then using the numeric filing system.

INFORMATION PROCESSING (IBT II)

STUDENT PERFORMANCE RECORD

INFORMATION PROCESSING (IBT II)

Student: ______________________________

This record is provided as an alternative to the student performance records at the end of each unit. It can be duplicated for each student and serve as a cumulative record of competencies achieved in the course.

Place a check by each objective the student achieved; you may wish to note the date that the student achieved the objective, also.

C = Core competencies

_____C1. Identified objectives of Information Processing.
_____ 2. Described individual gains from Information Processing.
_____C3. Identified considerations in career selection.
_____ 4. Identified occupations in BCA in the local community.
_____C5. Explained the leadership opportunities offered through membership in FBLA.
_____ 6. Explained the purpose of competitive activities and chapter awards.
_____C7. Increased typing speed 3-10 words per minute on 5-minute timed writings.
_____C8. Typed for 5 minutes with 5 or fewer errors.
_____C9. Identified correct safety procedures.
_____C10. Identified terms associated with human relations.
_____C11. Prepared a personal data sheet.
_____C12. Prepared a letter of application.
_____C13. Prepared a job application form.
_____C14. Prepared a follow-up letter.
_____C15. Prepared a letter of resignation
_____C16. Identified possible sources of job placement.
_____C17. Conducted him/herself appropriately on a personal interview for a job.
_____ 18. Identified travel terms.
_____C19. Identified information required to make reservations.
_____ 20. Identified the information included on an itinerary.
_____ 21. Selected material to be included in a travel folder.
_____C22. Classified expenses by general category as shown on an expense report.
_____C23. Used a flight schedule to determine air fare, flight time, flight number, and flight cost.
_____C24. Determined mileage from a mileage chart.
_____C25. Used a rental car guide to determine cost of renting an automobile.
_____C26. Estimated travel expenses.
_____C27. Prepared a travel application.
_____C28. Prepared an itinerary.
_____C29. Prepared an expense report.
_____ 30. Identified terms associated with planning meetings.
_____ 31. Identified the characteristics of three types of meetings.

____C32. Identified the steps to be taken when making pre-meeting arrangements.
____C33. Identified the pieces of information that must be gathered in order to schedule meeting facilities.
____C34. Identified the steps involved in reserving meeting facilities.
____ 35. Identified the information that must be included on a notice of a meeting.
____C36. Composed and prepared a meeting notice and prepared an agenda.
____C37. Identified four types of reference books available for use in an office.
____C38. Identified the three types of resources available for use by an office worker.
____C39. Used reference manuals to determine information.
____C40. Used a dictionary to identify languages from which words are derived, to divide words into syllables, to find word definitions, and to determine part(s) of speech for words.
____C41. Used a word book to determine how to hyphenate words, to write plural forms of words, and to write alternative spelling for words.
____C42. Prepared and submitted a mailable document using word processing software.
____C43. Prepared letters using full block and modified block letter styles and prepared envelopes according to U.S. postal regulations.
____C44. Prepared a personnel requisition form, a travel application form, a purchase requisition, an invoice, and a payroll form.
____C45. Prepared memorandums, tables, minutes, and a formal business report.
____C46. Typed a legal document.
____C47. Typed a medical report.
____C48. Completed a files management project on the microcomputer.
____C49. Designed and printed a data base report.
____C50. Designed and printed mailing labels.
____C51. Solved automated general ledger problems.
____C52. Solved automated accounts payable problems.
____C53. Solved automated accounts receivable problems.
____C54. Solved automated payroll problems.
____C55. Produced 3 mailable documents from recorded dictation.
____C56. Handled telephone inquiries.
____C57. Planed a call.
____C58. Recorded messages.
____C59. Used the telephone directory to locate telephone numbers for people, products, services, and businesses.

BUSINESS COMPUTER APPLICATIONS

STUDENT PERFORMANCE RECORD

BUSINESS COMPUTER APPLICATIONS

Student: ______________________________

This record is provided as an alternative to the student performance records at the end of each unit. It can be duplicated for each student and serve as a cumulative record of competencies achieved in the course.

Place a check by each objective the student achieved; you may wish to note the date that the student achieved the objective, also.

C = Core competencies

____C1. Identified advantages and disadvantages of the computer to individuals and businesses.
____C2. Identified the roles of and equipment used for input, processing and output in an information system.
____C3. Identified common disk operating systems procedures.
____C4. Identified correct safety procedures.
____C5 Identified objectives of BCA.
____C6. Described individual gains from BCA.
____C7. Identified considerations in career selection.
____C8. Identified occupations in BCA in the local community.
____C9. Explained the leadership opportunities offered through membership in FBLA.
____C10. Explained the purpose of competitive activities and chapter awards.
____C11. Designed a file.
____C12. Added forms to the file.
____C13. Edited selected forms.
____C14. Deleted selected forms.
____C15. Generated reports.
____C16. Printed labels.
____C17. Created and printed a mailable document.
____C18. Prepared an appropriate template and inserted given data for a personal, a business, and an educational application.
____C19. Completed an integrated application.
____C20. Used a graphics software program to generate a pie chart and a bar chart.
____C21. Completed an automated general ledger problem and an automated payroll accounting problem using a microcomputer.
____C22. Indexed and printed an alphabetical list of personal, business, and organization names.
____C23. The student designed and ran a simple BASIC program.
____C24. Completed a banking application on the computer.
____C25. Prepared a budget.
____C26. Completed a payroll problem.
____C27. Transmitted and received information on the computer.
____C28. Prepared a personal data sheet.
____C29. Prepared a letter of application.
____C30. Prepared a job application form.

___C31. Prepared a follow-up letter.
___C32. Prepared a letter of resignation
___C33. Identified possible sources of job placement.
___C34. Conducted him/herself appropriately on a personal interview for a job.

COMPUTER PROGRAMMING TECHNOLOGY I

STUDENT PERFORMANCE RECORD

COMPUTER PROGRAMMING TECHNOLOGY I

Student: ______________________________

This record is provided as an alternative to the student performance records at the end of each unit. It can be duplicated for each student and serve as a cumulative record of competencies achieved in the course.

Place a check by each objective the student achieved; you may wish to note the date that the student achieved the objective, also.

C = Core competencies

_____ 1. Proved the statement, "The lives of everyone are affected by computers."
_____ 2. Defined data processing and identify the concepts contained therein.
_____ 3. Recognized legal and ethical implication of computer use.
_____ 4. Identified and used periodical and text literature for computer research and reports.
_____ 5. Identified machines, concepts, dates, places, and/or persons associated with the history of computers.
_____ 6. Identified basic definitions pertaining to the history and uses of computers.
_____C7. Identified basic terms pertaining to computer hardware.
_____C8. Identified distinctive features of computers.
_____ 9. Identified the generations of computers and/or identified their characteristics.
____C10. Identified hardware for control, internal storage, and computation and/or identify computer classification by size.
____C11. Identified hardware, media, and terms related to input of data.
____C12. Identified internal (primary) storage, supplementary storage, off-line storage, and on-line storage.
____C13. Identified hardware, media, and terms related to output of information.
____C14. Identified various peripheral hardware.
____C15. Identified hardware, media, and terms related to mass data storage.
____C16. Identified terminology pertaining to support software.
____C17. Identified the fundamental characteristics of a program.
____C18. Identified the applied steps in writing and running a program.
____C19. Identified various programming languages and/or their type.
____C20. Identified facts pertaining to the history and characteristics of COBOL, FORTRAN, BASIC, PASCAL, and/or RPG.
____C21. Identified and used flowchart symbols and/or pseudocode specifications in various flowcharting applications.

____C22. Identified differences and/or similarities of compiler and assembler languages.

______23. Identified and/or utilized source documents and/or the role they play.

____C24. Identified the 4 basic components of the basic computer system.

____ 25. Identified facts pertaining to the punched card.

____ 26. Identified with regard to cards: field, unit record, file, and character or byte.

____ 27. Identified with regard to cards: master record, detail record, summary record, balance records, and program record.

____ 28. Identified various basic punched card unit record machines and the basic function each performed (key-driven card punch, card verifier, card sorter, alphabetic interpreter, reproducing punch).

____ 29. Planned and laid out a card.

____ 30. Identified with regard to cards: master, detail, summary, and balance file.

____ 31. Recognized that the punched card unit record system has analogies in the magnetic unit record system and name these.

____ 32. Differentiated between magnetic tape and magnetic disks and how data is stored on each.

____ 33. Identified differences/similarities pertaining to programming punched card unit record machines versus programming magnetic unit record machines.

____ 34. Defined terms, gave examples, and put in order from small to large those terms which characterize data.

____C35. Recognized and utilized the computer system to be used--its hardware configuration and characteristics.

____C36. Illustrated for character printers: power-on, load paper, line feed, form feed, and operations.

____C37. Illustrated for disk drives: power-on, load diskettes, unload diskettes and opening/closing drive doors correctly.

____C38. Differentiated between internal memory and auxiliary storage.

____C39. Identified and used correctly all keys on the keyboard (letters, numbers, graphics, special purpose, punctuation).

____C40. Operated computer and ran programs.

____C41. Recognized facts/handling techniques pertaining to diskettes.

____C42. Performed operations on diskettes such as formatting, copying diskettes, comparing diskettes, copying a file, comparing a file, and displaying a directory.

____C43. Identified online-realtime computer systems.

____C44. Illustrated how a mainframe/minicomputer with emulating PCs represents an online-realtime system.

____C45. Recognized that the mainframe/minicomputer uses a hard fixed disk for mass data storage and also that it uses diskettes for auxiliary storage and has internal memory.

____C46. Recognized how to run programs from mainframe/mini computers via emulating PCs and display work stations.

____C47. Differentiated between sequential and random access files.

____C48. Planed magnetic tape records.

____C49. Planed magnetic disk records.

____C50. Identified sequencing.

____C51. Identified selecting.

____C52. Identified merging.

____C53. Identified matching.

____C54. Identified match-merging.

____C55. Identified sequence-checking.

____C56. Identified utility programs and identified some of the routine jobs performed by them.

____C57. Identified application program, who writes it, and for what type jobs.

____C58. Identified systems software and/or some of its functions.

____C59. Identified operating system, listed several together with their developer(s) and/or some of their characteristics.

____C60. Demonstrated proper care and user responsibility in operating computer hardware.

____C61. Identified computer related devices/materials and/or stated reasonable costs for each.

____C62. Demonstrated correct keyboarding skills as appropriate for grade level.

____C63. Demonstrated correct usage of the BASIC Language's (DCUOTBL) input/output statements.

____C64. Designed, flowcharted, wrote, ran, and debugged (DFWRD) a BASIC program utilizing input/output statements.

____C65. DCUOTBL statements to perform arithmetic operations.

____C66. DFWRD a BASIC program which will perform almost all arithmetic operations, (Parentheses and raising to a power may be included).

____C67. DCUOTBL statements/techniques to document a program and edit a report.

____C68. DFWRD a BASIC program which will document a program and edit a report.

____C69. DCUOTBL statements for comparing.

____C70. DFWRD a BASIC program which involved comparisons.

____C71. DCUOTBL relational operators.

_____C72. DFWRD a BASIC program which will utilize relational operators.

_____C73. DCUOTBL statements for implementing simple FOR...NEXT...Loops.

_____C74. DFWRD a BASIC program which involved FOR...NEXT...LOOPS.

_____C75. DCUOTBL statements for implementing loops, nested loops, and interactive processing.

_____C76. DFWRD a BASIC program which will involve loops, nested loops, and interactive processing.

_____C77. DCUOTBL statements to define, load, print, and search an array.

_____C78. DFWRD a BASIC program involving arrays.

_____C79. DCUOTBL statements/techniques for establishing and implementing menus.
_____C80. DFWRD a BASIC program which involved establishing and utilizing a menu.
_____C81. DCUOTBL string functions.
_____C82. DFWRD a BASIC program which made use of string functions.
_____C83. DCUOTBL commonly used functions from algebra and trigonometry.
_____C84. DFWRD a BASIC program which utilized BASIC functions on algebraic and trigonometric applications.
_____C85. Defined data base and illustrated an application.
_____C86. Defined spreadsheet and illustrated an application.
_____C87. Defined word processing and illustrated an application.
_____C88. Integrated an application using data base and word processing and/or spreadsheet.
_____C89. Demonstrated simple usage of electronic communications by transmitting and receiving specified information.
_____C90. Identified jobs that use computers.
_____C91. Described how computers are used in variuos occupations.
_____C92. Listed several computer related career opportunities, their job responsibility, general education required, and/or salary ranges.
_____C93. Identified Future Business Leaders of America--Phi Beta Lambda, its acronym, its leadership and competition opportunities, and its opportunities for attending conferences.

COMPUTER PROGRAMMING TECHNOLOGY II

STUDENT PERFORMANCE RECORD

COMPUTER PROGRAMMING TECHNOLOGY II

Student: ____________________________________

This record is provided as an alternative to the student performance records at the end of each unit. It can be duplicated for each student and serve as a cumulative record or competencies achieved in the course.

Place a check by each objective the student achieved; you may wish to note the date that the student achieved the objective, also.

C = Core competencies

_____ 1. Identified a recent use of the computer, prepared a report on it using a word processor, and presented an oral report to the class.

_____ 2. Identified machines, concepts, places, dates, and/or persons associated with the history of computers.

_____C3. Identified terms contained within the scope of data processing.

_____C4. Identified the data processing cycle in a business organization.

_____C5. Identified terms related to hardware.

_____C6. Demonstrated proper care of the equipment and/or identified things that are harmful to the computer and related hardware and/or media.

_____C7. Identified hardware for control, internal storage, and computation; hardware for input of data; hardware for output of information; and hardware for mass data storage

_____C8. Graphically illustrated the relationship between the four functions performed and/or between the four types of hardware typically found in a computer center.

_____C9. Described the 80-column punched card and/or related terms

____C10. Identified terms pertaining to support software.

____C11. Named the four characteristics of a program.

____C12. Identified the 8 steps involved in program preparation.

____C13. Identified the names and/or types and/or example instructions of four programming languages.

____C14. Identified the shape and function of 17 flowchart symbols and/or identified steps in writing pseudocode.

____C15. Recognized and/or demonstrated X-3 Committee Standards of the ANSI for constructing flowcharts and/or recognized and/or demonstrated pseudocode writing skills.

____C16. Recognized various concepts and/or performed various operations of Boolean Algebra to several applications including propositions and circuits.

____C17. Demonstrated pictorially how data is represented within the computer using binary representation.

____C18. Demonstrated pictorially how data is stored using the Extended Binary Coded Decimal Interchange Code (EDCDIC) and ASCII Code.

____C19. Identified 3 types of primary storage.

____C20. Compared EBCDIC and ASCII representations of 3 characters.
____C21. Recognized and utilized the computer system to be used--its hardware configuration and characteristics.
____C22. Illustrated for disk drives: power on, load diskette, unload diskette, and opening/closing disk drive doors correctly.
____C23. Illustrated for character printers: power on, load paper, line feed, form feed, and operations.
____C24. Differentiated between internal memory and auxiliary storage.
____C25. Operated computer and ran programs.
____C26. Recognized facts/handling techniques pertaining to diskettes.
____C27. Performed operations on diskettes such as formatting, copying diskettes, comparing diskettes, copying a file, comparing a file, and displaying a directory.
____C28. Identified online-realtime computer systems.
____C29. Illustrated how a mainframe/mini computer with emulating PCs represents an online-realtime system.
____C30. Recognized that the mainframe/mini computer uses a hard fixed disk for mass data storage and also that it uses diskettes for auxiliary storage and has internal memory.
____C31. Recognized how to run programs from mainframe/mini computer via emulating PCs and display work stations.
____C32. Differentiated between sequential and random access files.
____C33. Planned magnetic tape records.
____C34. Planned magnetic disk records.
____C35. Identified sequencing.
____C36. Identified selecting.
____C37. Identified merging.
____C38. Identified matching.
____C39. Identified match-merging.
____C40. Identified sequence-checking.
____C41. Identified utility programs and identified 3 of the routine jobs performed by them.
____C42. Identified application program, who wrote it, and for what type jobs.
____C43. Identified systems software and/or identify 3 of its functions.
____C44. Identified operating system, listed 3 together with their developer(s) and/or one of their characteristics.
____C45. Demonstrated proper care and user responsibility in operating computer hardware.
____C46. DCUOTBL syntax for two-dimension arrays.
____C47. DFWRD a program utilizing two-dimension arrays.
____C48. DCUOTBL syntax for color and/or graphics.
____C49. DFWRD a program utilizing color and/or graphics.
____C50. DCUOTBL syntax for creating, writing, accessing, updating, and reading disk data files both sequential and random.

____C51. DFWRD programs for creating, writing, accessing, updating, and reading disk data files both sequential and random.

____C52. DFWRD a program (project) utilizing advanced BASIC techniques.

____C53. Identified the components of the Computer System Hardware configuration to be used and/or their characteristics.

____C54. Identified the four divisions of a COBOL program and the characteristics of each.

____C55. Identified the types of entries within each division.

____C56. Edited printed output using picture clauses and the knowledge of the data in storage.

____C57. Prepared the Data Division from a record layout (visually illustrated on punched card) and/or from a print line layout (visually illustrated on print layout form).

____C58. Named the 6 basic classifications of COBOL verbs and an example of a verb under each classification.

____C59. Identified and/or illustrated the meanings of destructive read-in and nondestructive read-out.

____C60. Edited printed output using picture clauses and the knowledge of the data in storage.

____C61. DCUOTBL syntax for input/output operations.

____C62. DFWRD a program to perform input/output operations.

____C63. DCUOTBL syntax for performing the 4 basic arithmetic operations.

____C64. DFWRD programs to perform some or all of the 4 basic arithmetic operations.

____C65. Described and/or identified answers pertaining to the rounding process.

____C66. DCUOTBL syntax to perform arithmetic operations, round, edit with a dollar sign, comma, decimal point, per cent sign, and/or sort.

____C67. DFWRD a program to perform arithmetic operations, round, edit with a dollar sign, comma, decimal point, per cent sign, and/or sort.

____C68. DCUOTBL syntax for accumulating final total(s).

____C69. DFWRD a program to prepare a report which will accumulate final total(s) of one or more items.

____C70. DCUOTBL syntax for making comparisons.

____C71. DFWRD a program in which comparisons are to be made.

____C72. DCUOTBL syntax for utilizing condition names to determine the processing to be done.

____C73. DFWRD a program in which condition names will determine the processing to be done.

____C74. DCUOTBL syntax for printing headings.

____C75. DFWRD a program to produce a report in which headings are to be printed.

____C76. DCUOTBL syntax for accumulating and printing minor as well as final total(s).

____C77. DFWRD a program to prepare a report in which minor total(s) as well as final total(s) will be accumulated and printed.

____C78. DCUOTBL syntax for accumulating and printing minor, intermediate, and major total(s).

____C79. DFWRD a program to prepare a report in which minor, intermediate, and major total(s) will be accumulated and printed.
____C80. DCUOTBL syntax to perform a table lookup.
____C81. DFWRD a program to perform a table lookup.
____C82. Illustrated simple usage of word processing.
____C83. Illustrated simple usage of data base.
____C84. Illustrated simple usage of a spreadsheet.
____C85. Illustrated simple usage of an integrated application of word processing and data base with or without graphs.
____C86. Illustrated simple usage of DOS.
____C87. Illustrated simple usage of Lotus 123 and/or with simple programmed macros.
____C88. Illustrated simple usage of d Base III Plus and /or with simple programming.
____C89. Demonstrated simple usage of electronic communications by transmitting and receiving specified information.
____C90. Identified computer careers and/or careers in which usage of computers is essential together with job responsibilities, training required, expected salaries, future job opportunity outlook, and/or job location.
____C91. Identified Future Business Leaders of America--Phi Beta Lambda, its acronym, its leadership and competition opportunities, and its opportunities for attending conferences.
____C92. Identified components of and prepared a resume.